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GUIDE TO VEHICLE MANAGEMENT OPERATIONS IN AN EXPEDITIONARY ENVIRONMENT

DEPARTMENT OF THE AIR FORCE

BY ORDER OF THE
SECRETARY OF THE AIR FORCE

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EXPEDITIONARY VEHICLE MANAGEMENT

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This handbook is designed to assist you in accomplishing vehicle management duties in an expeditionary environment. There are many areas that you must address in order to carry out operations in either a contingency or fight in-place location. Due to the large physical plant associated with vehicle management and the criticality of the vehicles that generate aircraft sorties or move a deployed unit to the field, you must be able to continue operations under wartime conditions. Whether your mission leaves you at your "home base" or takes you to the field there are several critical areas that need to be covered to effectively operate in a contingency environment. Operations in a contingency environment will expose vehicle managers to many situations and problems that would not be encountered in normal day-to-day operations. Contingency situations are difficult to predict since the variety of operating environments cannot be exactly defined. It will be impossible to totally prepare vehicle management personnel for all the tasks and complex problems that may arise in each situation. Consequently, deployed personnel must be prepared for flexible operations in such situations. The guidance in this handbook is based on the information found in: AFI 24-302 *Vehicle Management,* T.O. 36-1-191, *Technical and Managerial Reference for Motor Vehicle Maintenance,* and lessons learned from Operation Enduring Freedom and Operation Iraqi Freedom.

Ensure that all records created as a result of processes prescribed in this publication are maintained in accordance with AFPD 37-1, *Information Management* and AFMAN 37-123, *Management of Records* and disposed of in accordance with the *Air Force Records Disposition Schedule (RDS)* located at **https://webrims.amc.af.mil**.

Chapter 1

DEPLOYED LOCATION OPERATIONS

Section 1A—Vehicle Management Objectives and Responsibilities

1.1. General Guidance: When the deployed Logistics Readiness Squadron does not have a Vehicle Fleet Manager (VFM) or Vehicle Maintenance Superintendent (VMS) assigned, the senior ranking noncommissioned officer (NCO) with Air Force Specialty Code (AFSC) 2T3XX assumes those duties. After the initial phase of contingencies, the VFM/VMS implements responsibilities in AFI 24-302, **Chapter 3**.

Figure 1.1. Typical Vehicle Management Shop.

1.2. Reception/In-bound forces :

1.2.1. Reception Control Center (RCC): A RCC should be established at your location. The RCC provides overall direction and coordination of reception and beddown. They monitor arrival times of personnel and cargo. Contact them for updated information on any of your inbound forces.

1.2.2. Cargo Reception Function (CRF): A CRF should also be established at your location. It may be consolidated with the RCC. The CRF handles all cargo actions for the RCC. They collect documentation and monitor cargo shipment status. They may provide movement of cargo from holding areas based on prioritization given by local leadership. Contact the CRF for information on inbound UTCs.

1.3. Manpower. Manpower additives are required to maintain vehicles and satisfy vehicle management needs at operating locations. The MAJCOM concept of operations provides the basis for determining the number of personnel required. The host MAJCOM determines required manpower mix and sources personnel.

1.4. Facilities. Facilities at forward operating locations may consist of host nation buildings, Hardened Air Shelters, expandables, tents or other appropriate mobile units. Vehicle Management facilities support PM&I, unscheduled and intermediate level maintenance. Care needs to be taken in planning, to include ample electrical service, wash facilities, exhaust ventilation, compressed air source and explosion-proof utility systems for refueling vehicle shops. For planning purposes, shop working areas must accommodate

approximately 5 percent of the fleet at one time in addition to ancillary functions. Refer to AFH 32-1084, Facility Requirements, for exact space authorization formulas.

1.4.1. Mobile facility authorizations are outlined in Allowance Standard (AS) 158 (Harvest Falcon BEAR Base Support) and AS 159 (Harvest Eagle Support).

1.4.1.1. UTC XFBTD is a component of AS 158 Harvest Falcon BEAR Base industrial kit. It is designed specifically for Vehicle Management operations. It contains a large structure for repair operations and a smaller temper tent for administrative support. The kit also comes with AM-2 matting. VFM/VMSs need to request and monitor shipment of XFBTD when operating at a location without dedicated repair facilities.

1.4.1.1.1. UTC XFBTD will become part of the BEAR 550 Initial or BEAR 550 Follow-on sets after the Force Module system takes effect.

1.4.2. Facilities should be accessible to the key functions supported, e.g., sortie-generating; consider placement of repair facilities in close proximity to flight line and aerial port operations. It may be necessary to establish dispersed maintenance locations.

1.4.3. A separate facility for refueling trucks is highly desired. Some contingency locations may not have the capability to establish separate refueling vehicle maintenance shops. Those operating locations may be forced by necessity to combine maintenance operations. Combined maintenance operations can only be conducted under strict adherence to the following guidelines:

1.4.3.1. Applies to Diesel or JP-8 transporting vehicles only.

1.4.3.2. Properly train all assigned personnel in fuels maintenance safety procedures.

1.4.3.3. Maximum of one fuel truck inside shop at any time.

1.4.3.4. Properly ground vehicle with ground reel IAW TO 00-25-172, Ground Servicing of Aircraft and Static Grounding/Bonding.

1.4.3.5. No smoking within 50 feet of vehicle or shop area.

1.4.3.6. No spark or flame producing devices in immediate area.

1.4.3.7. The truck's fueling system will not be opened inside the shop. Repairs and service will be limited to the actual prime mover only (chassis, exterior, drive train, etc.). Truck fueling system repairs and maintenance must not be accomplished inside a combined maintenance shop.

1.4.3.8. Partially, or fully if feasible, drain vehicle prior to entering shop to reduce mass spill potential. If the vehicle cannot be drained, ensure fuel system is completely closed and there are no leaks before entering shop. Comply with all installation spill containment procedures.

Section 1B—Repair Operations

1.5. Organizational Maintenance. Organizational maintenance is maintenance accomplished by the using organization. During normal operation, the unit VCO ensures organizational maintenance is accomplished.

1.5.1. Increased level of operator maintenance is essential during wartime. Although this expanded role of operation is viewed as a battlefield reality, the vehicle mechanic will continue to perform the bulk of the intermediate maintenance workload.

1.5.2. The scope of increased operator maintenance and level of maintenance support (parts, tools, etc.) is determined by the using organization's VCO and the local VFM/VMS.

1.6. Mobile Maintenance. Vehicle(s) should be configured and equipped to provide the capability for jump-starts, tire inflation and minor repairs. **NOTE:** Truck, Maintenance 3/4 Ton, 4X4, Management code C260, makes a good platform for a mobile maintenance truck. The following specific ordering data enhances the basic vehicle: Diesel engine; transmission oil cooler, superstructure closed body, off-road body mounts, vise bracket, brush guard, towing package (pintle hook), winch electric (front bumper), Type A winterization, air conditioning, air compressor, welding machine, jump start capability and heavy duty suspension.

1.6.1. Mobile Maintenance can also be supported with a standard ¾ or 1 ton truck equipped with a "load-n-go" style utility box. This box should come fully equipped with tools, air compressor and jump start capability as part of the UFMXT UTC. The box can be installed with a forklift and moved from truck to truck if necessary to continue mobile maintenance operations.

1.7. Expanded Mobile Maintenance: On-scene repair is the goal of this concept. When implemented, the expanded mobile maintenance concept positions vehicle management personnel in key areas throughout the base to provide quicker response to major users as well as dispersed vehicle management assets.

NOTE: Ensure mobile truck fuel tank levels are always maintained above ½ tank. Fuel shortages, enemy action or increased FPCON may interfere with resupply actions.

1.8. Minor/Intermediate Maintenance. If a maintenance capability does not exist at deployed locations, a minimum essential maintenance capability is established using the following guidelines:

1.8.1. Preventive maintenance and inspections are performed only if the capability exists and operational mission tempo allows.

1.8.2. To the maximum extent, unscheduled maintenance is accomplished at dispersed locations prior to the onset of hostilities.

1.8.3. During contingency situations, repairs not affecting safe operation or operational capabilities may be waived. The senior on-site maintenance technician determines acceptable vehicle safety and serviceability standards.

1.8.4. Extensive use of cannibalization may be required to compensate for parts shortages and the uncertainty of resupply.

1.9. Vehicle Recovery. The Vehicle Operations element normally provides this service though it may be performed by vehicle management as locally determined. Ensure only qualified personnel operate wreckers if local guidance requires vehicle management to perform this function.

1.10. Repairs Which Exceed Local Capability: Contact host MAJCOM for procedures when repairs exceed local capability (including other military and contract sources).

1.11. Mission Critical Vehicle List: Each vehicle management operation employs a maintenance priority system which considers current battle conditions and mission requirements. The VFM or VMS, based on instructions from the battle staff, assigns priorities as necessary. Use the following tables as a guide:

Table 1.1. Priority I Vehicles, Sortie Generating.

VEHICLE TYPE	MODEL OR SIZE
Aircraft Refueler	R-9; R-11, R-12, FMSE
Aircraft Towing	MB-2, MB-4, U-30; Bobtails
Munitions Loading/Hauling	7.5T Crane; 10 Ton Tractor; 30/40 Foot Semi-trailer; 50K Container Handler; Forklifts assigned to munitions functions
Aircraft Servicing	Potable Water Truck; Deicer; Lavatory Truck; Staircase Truck
Aircraft Cargo Loading/ Unloading	A/C Loaders, 25, 40, 60K, and Wide Body/Lower Lobe Forklifts; 10K Standard F/L; 10K AT F/L; 40Ft Rollerized Trailer
Aircraft Launch Vehicles	Various commercial vehicles for crew transport, and aircraft maintenance

NOTE: Keyed to parts availability and local priorities, sortie-generating vehicles receive immediate maintenance attention.

Table 1.2. Priority II Vehicles, Sortie Sustaining.

VEHICLE TYPE	MODEL OR SIZE
Firefighting Vehicles	Structural, Crash and Rescue Firefighting Vehicles
Medical	Ambulance Bus; Ambulance, Modular
Materials Handling	Forklifts, 6K; Rough Terrain; 22K; Truck, 9Ton Hi-Lift
Explosive Ordnance Disposal	M113 Armored Personnel Carrier (APC); M1116 HMMWV, Armored Conversion
Fuel Support	Truck Tank 1200 gal; Trailer, Fuel 600 gal
Rapid Runway Repair	Truck, Dump 8CY; Tractor Dozer; Loader, 4CY; Roller, Vibrator; Tractor/Trailer 7.5Ton; Loader, Scoop, 2.5CY; Excavator; T/T 10T; T/T 22 T; Grader; Sweeper Vacuum; Standard trailer, 60T; Tractor, w/ broom
Snow and Ice Removal	Snow Plows, Blowers and Sweepers, Dump Trucks equipped with blowers, brooms and plows, Tractors equipped with brooms; Road graders designated and equipped for snow removal
Security Forces Vehicles	HMMWV; M113 APC; A/C equipped K-9 Vehicles; other critical vehicles assigned to Security Forces

1.12. Training. Initiate qualification training immediately if needed. The senior 2T3XX ensures personnel are qualified on available shop equipment, safety procedures, emergency response actions and assigned vehicle fleet.

1.13. Safety. Safety procedures must be in place and adhered to. For example: jewelry can not be worn while working around vehicles; jack-stands are in a safe and serviceable condition and being used when

required; safety glasses and hearing protection are in good condition and being used when needed; the two-person concept is in place and being used; etc.

1.14. Hazmat. Coordinate with the Civil Engineering Environmental section and Base Supply for the purchase of hazardous materials and waste storage containers if the site is projected to remain open more than 30 days. Also coordinate procedures for collection and disposal of hazardous waste with the Civil Engineering Environmental section. Download Material Safety Data Sheets for hazardous materials used in the work center from the web at **http://www.msdssearch.com**

1.15. Technical Orders/Records. Deploying units need to ensure they have all required TOs and records, (historical records, preventive maintenance list, training records, etc.) as identified in AFI 24-302. If adequate TO copies did not arrive with vehicles use the information guide in the back of this handbook or contact NAF and host MAJCOM for assistance.

1.15.1. Mitchell on Demand (MOD): MOD has been upgraded from the 15 CD version to a web based system. It can be accessed through the internet by anyone with an account. Users with an account can access MOD from other bases but the AF is subject to additional user fees. Contingency accounts are available at multiple deployment locations. Initiate contact with host MAJCOM to determine availability.

1.16. Tools and Equipment.

1.16.1. UTC UFMXK, Transportation Vehicle Maintenance Support Kit, is designed to support maintenance operations, at a bare base location, in the 1-30 day range. It is a light, lean, air transportable kit limited to one aircraft pallet position. Each UFMXE, Wing Vehicle Maintenance Element team, tasked to support a bare base location should be equipped with one UFMXK. If not, immediately contact local TMO, RCC, ATOC, NAF and/or MAJCOM to determine UTC actual location. If known, the TCN expedites tracking efforts. Your UFMXK should have all items listed in atch 2 of AFI 24-302.

1.16.2. UTC UFMXT, Vehicle Maintenance Heavy Support Kit, supplements UFMXK and is a heavy follow-on kit designed for arrival in the 30-60 day range. The kit contains portable shop cranes, wheel dollies, hydraulic hose equipment, heavy jacks, etc. The kit will also include a "load-n-go" utility box platform for mobile maintenance (requires truck with standard 8 foot bed), tire shop and heavy metals working capability. This kit should be immediately requested, through NAF or host MAJCOM, if your operating location is projected to remain open more than 30 days. Be aware that UFMXT will have to be unloaded and positioned with a container handler or crane. Preliminary coordination with other units may be necessary to expedite downloading.

1.16.3. Special Allowance Standard AS 058 is used to account for tool and equipment assets in a contingency environment. Authorization types and quantities are based on unit requirements. The host NAF or MAJCOM functional has final approval of authorization levels. After functional approval, contact host MAJCOM Supply Equipment Management section to establish a contingency equipment account.

1.17. Parts Organization. Assorted vehicle parts should be on hand from vehicle TMSKs, MRSPs, CHPMSKs and UTC packages. It is imperative that all parts and components be inventoried and organized as soon as possible. Shop equipment UTCs should have included cabinets and tools to expedite organization and storage efforts. Shop efficiency and mission effectiveness will suffer if the type and

quantity of on-hand items are not known or readily available. Parts should also be secured at any time the shop is unoccupied.

Figure 1.2. Materiel Control.

1.18. JP-8 Usage. Contingency locations may use JP-8 for ground fuels if diesel stocks and resupply are not adequate. Additionally, US Army supported locations utilize the single battlefield fuel concept. That concept relies on using JP-8 in place of diesel fuel.

1.18.1. The following information is provided to assist vehicle management personnel coordinate lubricity issues with POL:

1.18.1.1. JP-8 is a low sulfur fuel without the lubricating properties of diesel. Prolonged use may damage injection components and hamper mission accomplishment. Some manufacturer's pumps and components are more susceptible than others. AF approved additives are available to improve JP-8 lubricity for use in aircraft as well as ground fuel applications. POL personnel normally have the additive on hand, or can requisition it, but may not be aware of its importance to the vehicle fleet.

1.18.1.2. The additive is listed as Inhibitor, Corrosion/Lubricity Improver (CI/LI) MIL-PRF-25017. The NSN is 6850-00-292-9780 for a 55 gallon drum and 6850-01-180-1074 for a one gallon can. The additive must be injected in fuel supply bladders by POL personnel IAW TO 42B-1-1, Appendix A. TO 42B-1-1 (contained in list of mandatory contingency publications IAW AFI 24-302) also contains additional information about CI/LI.

1.18.1.3. Introducing JP-8 or JP-8+100 into a vehicle's diesel fuel system may cause an initial increase in fuel-borne particles. Potential damage is minimal but may cause temporary problems with filtering systems.

1.18.1.4. Initial and follow-on equipment UTCs, UFMXK and UFMXT, may be equipped with commercially available JP-8 lubricity additives. The commercial additives are provided to bridge the gap until POL injects ground fuel bladders with CI/LI. VM shops should ensure the most critical vehicles are treated with the limited additive stocks to prolong service life.

1.19. Maintaining AF Low Speed Vehicles (LSV) and Other Government Motor Vehicle Conveyances (OGMVC) in a Contingency Environment. All LSVs and OGMVCs will be inspected and maintained to manufacturer specifications. This ensures both safe operations and full life expectancy from AF equipment. When possible, using organizations will have LSVs and OGMVCs maintained through a local vendor contract. If a local contract is not a viable option, Vehicle Management will be responsible for maintaining the assets. Refer to AFI 24-302, paragraph 4.20 for additional guidance on tracking LSVs and OGMVCs.

1.20. "W" Registration Number Vehicle Management. Your location may have several types of "W" Registration number vehicles assigned (e.g. Deicer, Staircase Truck, Lavatory Vehicle, etc.).

1.20.1. These assets are tracked in OLVIMS and maintained by Vehicle Management. "W" registration vehicles are officially classified as equipment items and are managed by the owning organization on an equipment account. Consequently, replacements or additional assets have to be requested by the owning organization's equipment manager. The owning organization is also responsible for accomplishing disposition IAW local guidance for equipment items. VM can provide technical guidance to the owning organization on repair feasibility of heavily damaged, worn out or obsolete equipment.

1.20.2. Local leadership may not initially understand that some "vehicles" are not actually managed by VM.

1.21. Continuity. Establish continuity books, folders, files, etc. as appropriate for your location. Continuity is the key to seamless transition as one AEF or crew is replaced by another. Confusion over local/unique VM procedures can create delays in personnel departure, cause inefficient repair operations and hamper mission accomplishment.

1.21.1. Continuity information does not have to consist solely of official signed letters and OIs. It can also include locally generated checklists, guides or notes. Include information or guidance on: MAJCOM reporting procedures (frequency, content, reporting chain of command, etc.), supply actions (which sources provide what parts), LSV maintenance policy, MELs, unique operating conditions (AF units on Army base, other bases in theater), POCs in key units (ATOC, VCOs, Supply, NAF, MAJCOM, CONS, etc.), shop OIs or any other category required to fulfill VM responsibilities.

1.21.2. Shop OIs should cover the procedures in the following areas: ITK/CTK accountability and issue, Materiel Control, VM&A, NMCS, Duty hours, Standby, Mobile Maintenance, Safety, Housekeeping, Parts Procurement, DRMS, QC, etc.

Section 1C—Vehicle Management and Analysis

1.22. OLVIMS. All deployed units must ensure there is a procedure in place for fulfilling reporting requirements to higher headquarters. Units also need to ensure VM&A has at least a laptop computer and all required equipment IAW deployment guidance in AFI 24-302, Chapter 2.

Figure 1.3. Vehicles Awaiting Maintenance.

1.22.1. A 2T3X7, or qualified vehicle maintenance technician, is responsible for AF1823 preparation and ensuring vehicle repairs are accomplished consistent with priorities established by the VFM or VMS**.**

1.22.1.1. If a 2T3X7 is not available, use the Expeditionary Vehicle Management Handbook checklists to establish and operate OLVIMS. Contact NAF or MAJCOM for additional assistance if required.

1.22.2. All maintenance performed on vehicles requires documentation IAW procedures established by AFI 24-302, AFCSM 24-1 and host MAJCOM. OLVIMS is implemented and used as soon as practical, normally within 30 days. Elevate OLVIMS establishment problems to NAF and host MAJCOM.

1.22.3. All maintenance will be tracked manually if OLVIMS cannot be established. Information will consist of: vehicle registration number, current hours/mileage/date, system code/job description and any other appropriate remarks. In addition to requirements listed above, the manual PM&I program will also include start and due hours/mileage/date entries. Additional information can be added as necessary or directed.

1.23. Vehicle Fleet Accountability. Establish a Vehicle Control Point (VCP) upon arrival at a forward operating location. The VCP's primary function is to establish and maintain accountability for the base vehicle fleet (ensure FMSE is included) as soon as possible. This can be a difficult task in a contingency environment and may require a hands-on inventory. Coordination with ATOC, TMO and Logistics Plans may be required to identify inbound vehicles. Vehicle fleet size is controlled by AS 019 and/or vehicle sets as identified in the Force Module construct.

1.24. Establish a Vehicle Control Officer (VCO) program. Generate VCO list with 24 hour contact information. Brief VCOs (in mass or individually as mission permits) on official use, accountability, host nation/local use restrictions, accident procedures, weather/geographic related conditions and vehicle management procedures. Chapter four of the AFIS user manual deals with using organization and VCO information.

1.24.1. VCOs provide written justifications for any additional vehicle (GOV and Lease) fleet requirements above and beyond AS 019 or Force Module construct. Written justifications may not be feasible during hectic base establishment but should be implemented within 45 days of stand-up.

1.24.2. Ensure all fleet data is accurately entered into AFIS. AFIS is implemented and used as soon as practical, normally within the first 30 days. AFIS contains an automated user manual. It can be accessed by pushing the F2 key for help assist. The manual consists of nine chapters and several attachments. There is also a contingency AFIS guide located in the back of this handbook. Elevate AFIS stand-up difficulties to NAF and host MAJCOM.

1.24.3. Reconcile AFIS with OLVIMS. Generate hand receipts for unit VCOs to review and sign. A VAL may not exist but hand receipts are used to establish accountability.

1.24.4. Create a contingency Minimum Essential Level (MEL) list and Vehicle Priority Recall Listing (VPRL) if unavailable. If both listings are already in place, review them for accuracy and update if required. Route MEL and VPRL to Expeditionary Mission Support Group commander (or equivalent) for final approval. Brief MEL and VPRL purpose and procedures to VCOs and unit commanders.

1.25. Vehicle Lease Management: Special attention must be given to the lease fleet. Control must be maintained to prevent Fraud Waste &Abuse (FW&A). Create and maintain a tracking system for all lease vehicles. Contact Contingency Contracting if necessary to obtain accurate lease information. At a minimum, the system should contain: License/tag number, lease date, lease length, using organization, monthly lease cost and preventive maintenance intervals.

1.25.1. Coordinate with Contracting to ensure VM&A is notified of all vehicle lease requests before they are executed. Also ensure Contracting contacts VM&A before executing purchase request for vehicles or vehicle type equipment (ATVs, Scooters, Bobcats, trailers, etc).

1.25.2. It is imperative that lease vehicles receive preventive maintenance inspections on time. Vendors may demand extra compensation for voided warranties if manufacturer service intervals are not maintained.

1.25.3. Chapter five of the Automated Fleet Information System (AFIS) user manual deals with rental vehicles. It is important to note that vehicle leases cannot be tracked in AFIS unless they are against a valid vehicle authorization on the VAL. If your site was recently established, a VAL may not be available. Vehicle leases will have to be tracked by a locally developed or host MAJCOM directed method.

1.26. Destroyed Vehicle Replacement: Vehicles may be destroyed or rendered unusable by conventional, chemical, biological, radiological or nuclear weapons during combat. Rotate vehicles from lower to higher priority units to maintain base operations. Leasing may be required to fill shortages. Contact NAF or host MAJCOM to obtain replacement vehicles if necessary.

1.27. Reporting Requirements: Host MAJCOMs and other Air Force agencies require information for decisions necessary to support a deployed unit.

Figure 1.4. Vehicle Non-Mission Capable for Parts.

1.27.1. During the deployment phase, report capability to NAF/MAJCOM weekly or as directed. Send information copies to the main operating base and tenant organizations. Ensure Vehicle Management personnel at NAF and host MAJCOM are aware of any vehicle related Situation Report (SITREP) inputs.

1.27.2. During the first 30 days, the following information is required on a weekly or as directed interval. It will be provided by classified message or e-mail to the host MAJCOM commander, with information copies to the main operating base and tenant organizations.

1.27.2.1. Total priority 1 and 2 vehicles assigned, total vehicle losses and total non-mission capable for supply (parts) and maintenance.

1.27.2.2. Facility, equipment and technical data shortfalls.

1.27.2.3. Personnel and skill shortages.

1.27.2.4. For specific supply support difficulties requiring MAJCOM assistance, list vehicle registration number and type, part number, date parts ordered, requisition number and status. Host MAJCOMs develop procedures for reporting vehicle status when repairs exceed local capability (including other military and contract sources).

1.27.3. After the initial 30 day period, initiate fleet management reporting from AFIS. Required documents are: Ship, Salvage and Rotate report; Newly Received Vehicle report; and Host Base Transmit/receive report. Reports are due to the host MAJCOM NLT the 10th of each month. Chapter two of the AFIS user manual provides guidance on asset reports.

1.27.4. Additional reporting requirements and timelines are established by the host MAJCOM commander as required.

1.27.5. Reports Control Symbol. MAJCOMs and other Air Force agencies assign a reports control symbol to recurring and one-time reporting requirements.

Section 1D—Materiel Control

1.28. A supply technician (AFSC 2S0X1) is assigned to vehicle management to perform materiel control functions as specified in AFI 24-302 Chapter 5. Materiel Controllers are normally tasked to deploy for

direct support of VM functions. Contact NAF or host MAJCOM for assistance if the Materiel Controller has been diverted to another base unit/flight or has not arrived.

Figure 1.5. Vehicle Spare Parts Storage.

1.29. Parts Support: The host MAJCOM specifies how to accomplish follow-on spare parts support to the theater of operations. WR-ALC establishes priority procedures to provide expedient critical spare parts support to the MAJCOM and deployed units. When local or centralized theater spares support capability does not exist, source spares from CONUS for immediate air transport to the theater via express (DHL or FedEx style) air service.

1.29.1. Local Materiel Control personnel coordinate resupply efforts with RSS, deployed supply and contingency contracting functions to establish a responsive vehicle parts ordering system. Parts procurement can consist of using local purchase, base supply system and the internet. Innovations in information technology, worldwide commercial delivery and government reforms have made internet parts sourcing through commercial vendors, Blanket Purchase Agreements (BPAs) and the Government Purchase Card (GPC), a viable alternative to traditional parts acquisition methods.

1.29.2. A Regional Supply Squadron (RSS) should be in place to support contingency operations. Other support systems will be identified in theater unique supplements.

1.29.2.1. The RSS is generally divided into three divisions (Ground Support, Base Operating Support (BOS) and Local Purchase) for vehicle parts procurement. The Ground Support Flight provides MICAP support for vehicle management activities. The BOS division takes care of NSN items. There will also be a local purchase element to handle non-NSN requirements.

1.29.2.2. Aggressively follow up with local LRS supply function, NAF or host MAJCOM to establish contact with RSS. RSS contact information is also available in the deployment parts sourcing guide in the back of this handbook.

1.30. Working Stock : Deploying units must ensure there is a sufficient on-hand supply of working-stock parts (based on the amount of deploying vehicles). Ensure parts on-hand must be for the type of vehicles deployed.

1.31. Bench Stock: The supply system will not always enable establishment of bench stock accounts at deployed locations. Working Stocks and CHPMSKs can be used in place of Bench Stock support.

1.32. Contingency High Priority Mission Support Kit (CHPMSK): After initial deployment, vehicle parts support may be improved by establishing a CHPMSK. A CHPMSK is established through coordination with the local RSS and approved at the host MAJCOM level.

1.32.1. CHPMSK's support mission critical vehicles and consist of parts requested by owning unit (after approval by host MAJCOM). Once established, they are stored at the deployed location in the local RSS warehouse. Parts are issued when a supply demand is levied. RSS personnel automatically requisition replacements. CHPMSK requisitions receive a much higher priority than regular bench stock.

1.32.2. Contact local RSS personnel and host MAJCOM for additional guidance.

1.32.3. Elevate supply difficulties to NAF or MAJCOM if unable to resolve at local level.

Chapter 2

COMBAT OPERATIONS.

Section 2A—SABC, ATSO and CBRNE Operations

2.1. General Information. Provisions of this chapter can apply to units operating in either an expeditionary environment (e.g. Southwest Asia) or a more traditional fight-in-place (e.g. Republic of Korea) location. Combat operations can create situations where all, some or none of the following information may be relevant to your location at a given time. Apply appropriate guidance from any sections applicable to your situation.

Figure 2.1. Work Area Bunker.

2.2. Self-Aid and Buddy Care (SABC). All assigned personnel must have been trained on SABC. The training must be documented on the AF Form 1098 (or a locally generated form for E8's and E9's) and must be current (training is valid for two years). Initiate refresher training if personnel are not current. Refer to AFH 32-4014V4 ATSO guide for additional training guidance.

2.2.1. Although individuals may have been trained and certified, supervisors still need to ensure their troops can perform SABC procedures while in the "heat of battle", i.e., when an attack has just taken place and there are several victims with multiple and varying wounds. The best way to get proficient is to practice.

2.2.2. SABC kits must be available and complete to accomplish on-scene SABC. Supplies should include but are not limited to: splints, bandages, dressings, etc. Make kits as mobile as possible so individuals performing SABC can quickly move from one victim to the other.

2.2.3. All assigned individuals must know the location of the Casualty Collection Point (CCP). A vehicle must be made available for transporting victims to the CCP, i.e., the Mobile Maintenance truck, vehicle from ready line, etc. Individuals also need to know the proper safety procedures for transporting victims in a vehicle.

2.3. Ability To Survive and Operate (ATSO). All assigned personnel should have a current ATSO guide with them and be familiar with the contents. They also need to be aware of any unique local procedures, i.e. attack warning methods, post attack reporting procedures, etc.

2.3.1. Bunkers. Local Civil Engineers are normally charged with constructing most perimeter and large defensive positions. Base wide details may be formed to expedite bunker construction and hardening efforts. Bases supported with Army BOS may not have an AF CE element to build common area bunkers.

2.3.1.1. Each shop should be capable of designing and constructing adequate protection for personnel, equipment and facilities. Ensure bunkers are erected in the shop and living areas if your location has the potential for any type of enemy attack.

2.3.1.2. Before deciding where to place a bunker, consider proximity to flammables/combustibles (POL storage, HAZMAT), likely targets (vehicle concentrations, large buildings, aircraft), probable type of attack (mortars, small arms, missiles, car bomb) probable direction of attack (shop on interior or exterior of base, compound entry control point), etc.

2.3.1.3. Work area bunkers should be large enough to accommodate at least one full duty shift. Living area bunkers should be large enough to accommodate all personnel residing in tent/facility. Consider multiple defensive positions to minimize personnel loss if one position is destroyed. It is imperative that bunkers be kept clean and in good repair. Do not use them for storage. They should be inspected weekly to ensure they are combat ready.

Figure 2.2. Living Area Bunkers.

2.3.1.4. Be cognizant of nearest bunker location regardless of where you are on the base (e.g. dining facility, post office, BX/PX, transiting between off and on duty locations, etc.). An attack can occur at anytime and immediate response in crucial.

2.3.1.5. If possible, provide hardened protection for any vehicles considered to be critical to Vehicle Management operations. Include mission critical vehicles in the shop for maintenance. Ensure vehicles are secured when not in use. Windows should be rolled up as much as possible when a chemical threat is present.

2.3.1.6. If possible, provide hardened protection for facilities. Facilities are crucial for safe and efficient repair operations. Concentrate protective efforts on areas containing the most valuable resources (highest average concentration of personnel, equipment, etc.).

2.3.1.6.1. See AFH 10-222V14, *Guide to Fighting Positions, Obstacles and Revetments*, for additional guidance.

2.3.2. Rally Points. Rally points are designated locations where personnel gather after enemy action, natural disaster or man-made accident causes evacuation of working or living areas. Evacuation may occur unexpectedly and be accompanied by high levels of confusion.

2.3.2.1. Designate primary and alternate rally points well before they are required. To the greatest extent possible, select rally point locations that provide adequate protection for personnel. Ensure all personnel are well aware of all rally point locations. Training drills may be required to ensure all personnel can respond quickly and correctly.

2.3.2.2. The ranking member at a rally point assumes control until relieved by a senior member. Conduct head counts as soon as possible for immediate reaction and reporting. Pre-made rosters of assigned personnel should be available to ensure 100% accountability.

2.3.3. Local Nationals (LN) and Third Country Nationals (TCN). You may be required to escort LNs, TCNs or contractors at a deployed location. Training should be provided, normally from Security Forces or Civil Engineering, for any personnel required to escort LN/TCNs.

2.3.3.1. LN/TCN escort duty ensures the safety and security of friendly forces. LN/TCNs may be escorted by other personnel while working in your immediate area. This does not relieve you of user-security requirements. Immediately report any suspicious activities to security forces, your supervisor or appropriate authorities.

2.3.3.2. It is important to note that LN/TCNs may not be interested in directly harming friendly forces but may be gathering intelligence information for other parties. They may also be interested in acquiring any items of value for resale off base.

2.3.4. Weapons. Some locations may require carrying weapons at all times. Others may only require weapons under certain conditions (e.g. increased threat, mobile maintenance to certain locations, off base travel, etc.).

2.3.4.1. If an armory has not been established weapons may have to be stored in your living or work areas. Ensure weapons are protected from unauthorized access but are still readily available to members (e.g. combination lock, adequate number of personnel with lock keys, etc.).

2.3.4.2. Weapons should be function checked before any operation where they may be needed (guard duty, convoy, mobile maintenance, etc.) or at least once a week. They will also need to be cleaned, lubricated and maintained IAW ATSO guide. Weapons stored in a dry environment are extremely susceptible to jamming due to dust and grit.

2.3.4.3. Supervisors need to ensure all personnel are M-16 or M-9 qualified as appropriate and are familiar with weapon's safety procedures.

2.3.5. Unexploded Ordnance (UXO). The ATSO guide provides plenty of guidance on how to identify and respond to UXOs after an enemy attack. Ensure all personnel are familiar with all UXO procedures. Enemy forces may also plant Improvised Explosive Devices (IED) in the local area (on or off base).

2.3.5.1. UXOs (including land mines) may be present even though there have been no recent attacks or enemy activity. Many deployed locations have been the scene of past conflicts. As a

result, UXOs may be common place. Remain vigilant of possible land mines and ordnance even in unmarked areas. Recent construction activity can also unearth explosive devices.

2.4. Counter-Chemical, Biological, Radiological and Nuclear High Yield Explosive (CBRNE) Operations. Hands-on refresher and qualification training should be accomplished to ensure all troops are proficient and prepared for all CBRNE operations. Ensure all assigned personnel know the proper procedures for wearing both versions of the Ground Crew Ensemble (GCE). Assigned personnel may be equipped with one or both variations. Resupply of GCE may also include older and newer versions. It is imperative that troops are as familiar as possible with GCE before combat.

Figure 2.3. Personnel Working in MOPP Level 4.

2.4.1. All assigned personnel must be familiar with all Mission-Oriented Protective Postures (MOPP) levels. They also need to know proper venting procedures. Battle Staff Directives (BSDs) should be issued to provide ventilation guidance or other changes to wear of GCE.

2.4.2. Ensure all personnel practice drinking water from their canteen while wearing a gas mask before hostilities.

2.4.3. All personnel must be familiar with the procedures for changing mask filters. Ensure everyone is aware that blood agents damage gas mask filters. Filters exposed to blood agents should be replaced as soon as possible after the attack. A BSD should be issued requiring mask filter changes.

2.4.4. Personnel must know how to use nerve agent antidotes (e.g. when to give them, where to inject them, which one is given first, what to do with used injectors, how long to wait between injections and the procedures for administering the injectors to a buddy).

2.4.5. Personnel must also be familiar with the proper procedures for taking pyridostigmine bromide tablets (P-tabs). BSDs will be issued directing the use of P-tabs.

2.4.6. All personnel must know proper decontamination procedures (e.g. how to accomplish personal/equipment decontamination, which kit is most effective under different situations, the proper way to irrigate their eyes, etc.).

2.4.7. Each deploying or fight in-place unit should have an alarm/giant voice system in place. Leadership should use this system to inform assigned personnel of current conditions and information requiring immediate release.

2.4.8. All assigned personnel must adhere to locally generated procedures and policies, i.e., Operating Instructions, Field Operating Instructions, etc.

2.4.9. All assigned personnel must know how to correctly use knock codes, duress words, sign/countersign and chemical codes. BSDs will be issued containing code information. This information is normally time sensitive and is changed regularly. It may also be changed if compromised. All personnel should make every effort to stay informed of the latest codes. Failure to do so may cause detainment by security personnel or prevent access to facilities and contamination control areas.

2.4.10. During possible CBRNE pre-attack actions, suspend all operations requiring respirator use and shut down breathing air compressors. Also shut down all Heating, Ventilation, and Air Condition (HVAC) to prevent contamination of building interior. Close all windows and doors.

2.5. Specific Vehicle Management Operations in a CBRNE Environment. This section contains procedures for identification, marking, tracking and maintenance of vehicles contaminated during hostilities or contingency operations. Vehicles may be contaminated by chemical, biological, radiological or nuclear weapons. Chemical contamination means is considered the primary threat to USAF assets.

2.5.1. The intent during a conflict or contingency is to minimize the potential for vehicle contamination while, continuing to support the mission. If contamination avoidance fails; emergency (hasty) decontamination, proper identification and tracking in concert with USAF-approved counter-chemical warfare concept of operations (C-CW CONOPS) will be used to continue safe vehicle operation until disposition.

2.5.1.1. AFMAN 10-2602, *Nuclear, Biological, Chemical, and Conventional (NBCC) Defense Operations and Standards*, approved C-CW CONOPS training media distributed by HQ USAF and Chapter 8 of AFI 24-302 are the primary sources for data in this section.

2.5.2. Descriptions of C-CW Factors. Primary factors of C-CW CONOPS must be recognized and adhered to for success in coping with contaminated vehicles. The following are descriptions of those factors:

2.5.2.1. The 10-Foot Rule. The 10-foot rule is an essential aspect of C-CW CONOPS, especially when dealing with contaminated vehicles. The 10-foot rule is a two-phased approach to working around contaminated assets. The first phase of the 10-foot rule involves the period of time (generally within first 24 hours after contamination) personnel must remain in MOPP 4 when within 10 feet of contaminated asset. Phase 2 allows removal of gas mask when working within 10 feet of contaminated assets (generally after first 24 hours after contamination). The 10-foot rule is designed to maximize comfort and survivability during work cycles. Detailed 10-foot rule information is contained in Interim Change 2003-1 to AFMAN 10-2602, *Nuclear, Biological, Chemical, and Conventional (NBCC) Defense Operations and Standards,* paragraph A2.4.9.7.

2.5.2.2. Contamination Avoidance. Vehicle contamination generally occurs from enemy attack or by contact from another contaminated source. An example of primary contamination avoidance is to park vehicles inside facilities or to cover them with plastic barrier material prior to attacks. An example of avoiding contamination from another contaminated source is to ensure vehicle operators do not touch vehicle surfaces with contaminated gloves or boots. Likewise, personnel must avoid contaminating themselves when working around contaminated assets. Discipline, awareness and prevention will safeguard and conserve MOPP gear, decontamination supplies, shop supplies and most importantly will protect personnel.

2.5.2.3. Immediate (Expedient or Hasty) Decontamination. Expedient or hasty decontamination employs M295 or M291 decontamination kits or 5% chlorine bleach solution to perform immediate decontamination of a surface that must be touched after an attack. This action helps prevent a liquid contact and transfer hazard to personnel who must continuously touch contaminated vehicle doors, handles, etc., before weathering can sufficiently reduce the threat of liquid or vapor contamination.

NOTE: The 5% chlorine solutions have trouble maintaining a contact time with vertical surfaces.

2.5.2.4. Glove Use. When a vehicle or any other asset is contaminated, it is considered for operational purposes to be contaminated forever. Therefore, any contaminated asset, regardless of when the contamination occurred, will not be touched without at least wearing gloves to protect the hands. Bare skin will not touch any part of a contaminated asset. The use of gloves weighs operational risk against personnel comfort during work cycles. Any type of glove may be worn.

2.5.2.5. Weathering. Vehicles and other assets can have the chemical hazard reduced over time by weathering. Placing vehicles in wind, precipitation or direct sunlight accelerates evaporation of chemical contamination. Weathering is the cheapest and safest form of decontamination, and if the contaminated vehicle is not mission essential, weathering is the best decontamination option.

2.5.2.6. Identification of Contaminated Vehicles. Contaminated vehicles may not be easily identified. Chemical contamination will generally occur in small amounts and will be easily absorbed. Frequently, there will be no outward evidence of contamination. The following actions and precautions must be taken to increase the chances of safely identifying contaminated vehicles:

2.5.2.7. Assumptions. If there has been a chemical attack, assume unprotected vehicles are contaminated until proven otherwise.

2.5.2.8. Protective Gear and Equipment. Never attempt contamination identification without donning MOPP gear. Ensure M291 and M295 decontamination kits and 5% chlorine bleach solution is readily available. Do not contact vehicles with anything other than with M-8 paper and gloves unless absolutely necessary. Separate clean and dirty vehicles and if possible use only clean vehicles. Protection of personnel ground crew ensembles from casual contamination is critical.

2.5.2.9. Differences Between Standard and CARC Painted Vehicles. Most vehicles are painted with polyurethane paint. Polyurethane paint is porous and easily absorbs chemical agents and offers a greatly reduced liquid contact and transfer hazard after a short period of time. Chemical Agent Resistant Coating (CARC) resists absorption of chemical agents for up to six hours. CARC painted vehicles present a liquid contact and transfer chemical hazard for longer periods than polyurethane-painted vehicles. Tactical vehicles (HMMWV, M1008, etc.) are usually painted with CARC. CARC is readily identifiable by its rough surface and dull appearance. CARC painted vehicles are usually, but not always, applied in a camouflage pattern. CARC painted vehicles should be stenciled or stamped with “CARC” near or on the vehicle data plate.

2.5.2.10. M-8 Paper. Pre-positioned M-8 paper is generally the best method of contaminated vehicle identification available to vehicle management. Proper horizontal positioning of the paper on vehicles is crucial to its effectiveness. Also ensure M-8 paper is positioned on stationary objects, such as pedestal mounted flat surfaces. Typical areas to position stationary M-8 paper pedestals or placards are incoming lines, ready lines, parking areas, etc.

2.5.2.11. Check for Contamination. Check impervious vehicle surfaces for contamination. Vehicle windshields, polished metal and chromed areas are more resistant to contamination absorption than paint, plastic, rubber or fabric. Glass can retain chemical agents on the surface for much greater periods than other vehicle surfaces. Check these areas for contamination with M-8 paper after attacks. They will provide the best surfaces for contamination identification. This is especially crucial if M-8 paper was not positioned on the vehicle prior to an attack. All vehicle management personnel performing these checks must have sufficient supplies of M-8 paper on hand.

2.5.2.12. Identify Contamination Area. If possible, mark areas of contamination found on vehicles. Use the NBC marking kit or tape, grease pencils, etc. to mark contaminated areas as best as possible without covering the actual contaminated area. Annotate the vehicle's AF Form 1800 with the date and time contamination occurred, what type of contamination exists and where it is located on the vehicle.

2.5.2.13. Marking Contaminated Vehicles. Proper marking of contaminated vehicles is absolutely critical to safeguarding personnel and ensuring proper tracking. All vehicle operators are held responsible for marking contaminated vehicles as follows:

2.5.2.13.1. Standardized Symbols. Contaminated vehicles will be marked with the Standard NATO agreement (STANAG) symbol. Do not mark the symbol when a vehicle has been contaminated less than 24 hours (phase 1 of the 10-foot rule). Mark date and time contamination was discovered on STANAG symbol 24 hours after initial contamination (phase 2 of the 10-foot rule assumption). If manufactured STANAG symbols are unavailable, reproduce the symbol as closely as possible with material that can withstand temporary use. Also, annotate the date, type, time, and location of contamination on the vehicle's applicable AF Form 1800.

2.5.2.13.2. Temporary Marking Placement. Prominently place contamination symbols on front (lower center of windshield if possible), sides and rear of vehicle in as conspicuous places as possible. A contaminated vehicle should be readily identifiable from all angles. Ensure that temporary markings are secure and sturdy enough to remain in-place until permanent markings are applied.

WARNING: Do not attempt to place contamination markings on front windshields if the action will require personnel to physically contact the vehicle with other than gloves (heavy equipment, busses, AT forklifts, etc.). Mark the front of the vehicle as close to the windshield as possible. Ensure marking is still prominently visible. Permanent markings on windshield can be applied later when precautions have been taken to prevent personnel contamination. This procedure will prevent unnecessary contamination of personnel GCE when trying to mark large or tall vehicles.

2.5.2.13.3. Permanent Marking Placement. Permanent markings should be applied to vehicles with stencil and automotive paint. Marking placement must match temporary marking identification requirements described above. Painted markings will duplicate the appearance of the STANAG symbol. For example, a vehicle contaminated with chemicals would have painted yellow upside-down triangles with the word "GAS" painted in red on the yellow background. Refer to AFMAN 10-2602, Attachment 6, paragraph A6.6.2, for specific information concerning STANAG symbols.

2.5.2.14. Tracking Contaminated Vehicles. Perhaps the most important part of contaminated vehicle management is tracking, both short and long-term. Follow the tracking actions listed below:

2.5.2.14.1. Vehicle Operator responsibilities. All operators are responsible for identifying, marking (with contamination markers) and reporting contaminated vehicles. The following information will be entered into the vehicle's AF Form 1800: date and time contamination occurred, type of contamination and where it is located on the vehicle. Operators will report contaminated vehicles by registration number to their organization's Unit Control Center (UCC). The report will include registration number, date and time contamination occurred, type of contamination, and where contamination is located on the vehicle.

Figure 2.4. Responding to a Wrecker Request.

2.5.2.14.2. Unit responsibilities. Using organizations are responsible for reporting their contaminated vehicles by registration number to the Wing Operations Center (WOC) or Survival Recovery Center (SRC).

2.5.2.14.3. WOC/SRC responsibilities. The WOC/SRC is responsible for compiling contaminated vehicle data and forwarding it to the Wing's Logistics Readiness Squadron (LRS), or equivalent, UCC.

2.5.2.14.4. LRS UCC responsibilities**.** The LRS, or LRS-equivalent, UCC is responsible for providing contaminated vehicle reports to vehicle management. The LRS UCC will provide updates at least daily.

2.5.2.14.5. Vehicle Management responsibilities. Vehicle management will ensure they receive updates from the LRS UCC at least daily. Vehicle Management will reconcile compiled lists of contaminated vehicles to assure accuracy. Ensure mobile maintenance has most current list. Vehicle management will inspect all incoming and recalled vehicles and their AF Form 1800s for contamination identification. All vehicle registration numbers will be compared against the contaminated vehicle listing. Forward contaminated vehicle information to MAJCOM at least weekly or more often as required.

2.5.2.14.6. Vehicle Management and Analysis (VM&A) responsibilities. VM&A will open a delayed work order on all contaminated vehicles. Vehicle discrepancy will be annotated as system code "43AZ". Discrepancy line item will annotate "vehicle contaminated during contingency." Vehicle contamination will be identified on the work order in as much detail as possible, with attachment if necessary. Delayed code "B" will be applied to this line item, and vehicle will be removed from service and held for disposition. VM&A will coordinate with the

installation Civil Engineering Readiness office to determine an appropriate contaminated vehicle parking area. Ensure parking area is correctly marked. Vehicles will be held in delayed code "B" status until directed by higher headquarters.

2.5.3. Mission Critical Contaminated Vehicles. The installation/wing commander may direct the use of contaminated mission essential vehicles. Sortie generating, sortie sustaining, emergency response and force protection vehicles are possible examples. Do not use contaminated vehicles unless specifically approved by installation/wing commander.

2.5.3.1. Contaminated vehicles identified as mission essential will be operated and serviced under the same restrictions as maintenance on contaminated vehicles (outlined in the next paragraph). Coordinate contaminated vehicle use requirements with installation Civil Engineering readiness personnel.

2.5.4. Maintenance on Contaminated Vehicles. Contaminated vehicles will always be treated as such regardless of when contamination occurred. Maintenance should only be performed as a mission essential action. The following actions must be taken to ensure safe, expedient contingency repair of contaminated vehicles:

2.5.4.1. Contaminated vehicles in phase 1 of the 10-foot rule will be approached or maintained only while dressed in MOPP 4. Contaminated vehicles in phase 2 of the 10-foot rule may be approached without wearing gas mask (all other MOPP gear is worn). The installation commander may implement more stringent guidance if necessary.

2.5.4.2. Only gloved hands should touch a contaminated vehicle. No other contact must occur unless absolutely necessary. Barrier material will be used between the vehicle and the technician to protect themselves and their MOPP gear. Examples of barrier materials include coveralls, rain gear, plastic sheeting, etc. When operating the vehicle or if the interior of the vehicle is contaminated, shield technicians by covering seats, floorboards, and even steering wheels with barrier material. Body heat and pressure (from sitting) increase the potential for liquid chemical agents to penetrate the ensemble. If unprotected contact with a contaminated vehicle occurs, follow appropriate personal decontamination procedures. Ensure barrier material used inside vehicle will not interfere with safe operation.

2.5.4.3. Ensure adequate amounts of 5% chlorine bleach solution, protective gear, M-8 testing paper, M291 and M295 decontamination kits and shielding material are available at all times.

2.5.4.4. Monitor shop personnel for signs of chemical exposure at all times. The 10-foot rule is a guideline, but caution cannot be overstated.

2.5.4.5. If heat is to be used on a contaminated vehicle (e.g. welding operations) MOPP 4 must be worn by all personnel at all times around vehicle during task. Heat can release absorbed chemical contamination into potentially lethal levels of vapor. After the heat-related task is complete, place the vehicle in optimum position for weathering and initiate phase 1 10-foot rule, to include using contamination markings. Do not approach within 10 feet of the vehicle without donning MOPP 4 until after phase 1 of the 10-foot rule has passed.

2.5.5. Shop Layout. Specific preparation must be accomplished to maximize safety and serviceability for vehicle management shops operating in a chemical environment. Use the following guidelines to ensure minimal contact during contaminated vehicle repairs:

2.5.6. Repair Stall. Designate and segregate one stall, if possible, for repair of contaminated vehicles to minimize possible shop contamination. A stall with an unpainted floor will speed absorption of any chemical contamination present. Contaminated vehicles will not readily transfer contamination from their tires to the floor. It is not necessary to decontaminate the floor area after each vehicle departs. As a safety precaution, if possible, decontaminate the maintenance floor with a 5 percent chlorine solution once per shift. If possible, do not paint the shop floor. Depending on the type of paint used, an extended residual hazard will exist if the paint used on the floor is non-porous.

2.5.7. Tools. Dedicate jacks, jack stands, tools and other equipment as necessary for the contaminated vehicle repair area. Mark the items clearly for use only in the contaminated repair area. Make 5% chlorine bleach solution and M291/M295 decontamination kits readily available for tool cleanup. **NOTE:** Keep in mind that there is a contact time associated with decontaminating tools.

2.5.7.1. Tool Decontamination. Probability that tools will receive much, if any contamination from contact with contaminated vehicles is small; especially if no liquid agent is present. However, tools used for contaminated vehicles will be handled with gloves during use and decontaminated in 5% chlorine bleach solution after use. Soak the tools for at least 30 minutes to ensure any possible contaminant remaining on the surface of the hand tool is neutralized. For power tools and diagnostic test equipment that may be contaminated, clean using decontamination kits if possible and allow them to receive ventilation. When performing maintenance on contaminated assets, or when using contaminated equipment or tools, whenever possible, ensure those activities are conducted in an open area with a large airflow. If performing maintenance in an enclosed area, raise the warehouse or garage doors, unless security precautions prevent these actions. Ensure that all items are marked appropriately IAW Air Force guidance and procedures.

2.5.8. Housekeeping. As a safety precaution, ensure vehicle management shop floors are mopped periodically (at least once per shift) with 5% chlorine bleach solution to maximize contamination control.

2.5.9. Contaminated Waste Disposal. All contaminated barrier products, garments, etc., will be placed in approved containers and disposed of IAW local guidance.

2.5.10. Mobile Maintenance/Wrecker Service. Additional contaminated vehicle hazards may be present when performing mobile maintenance. Use the following actions when conducting mobile maintenance or wrecker support:

2.5.10.1. Ensure adequate amounts of barrier material, protective equipment, M-8 paper, 5 % chlorine bleach solution in sealed containers, M291/M295 decontamination kits and plastic trash bags are available in the mobile maintenance truck. If while working on a vehicle and contamination is suspected, decontamination efforts should be exercised prior to re-entering the vehicle. Carry “shuffle boxes” to decontaminate feet prior to re-entry into mobile trucks. Cover mobile maintenance truck seats and steering wheel with barrier material. Ensure barrier material used inside mobile maintenance truck will not interfere with safe vehicle operation.

2.5.10.1.1. As a safety precaution, always wear work gloves when working with or around previously contaminated vehicles, aircraft, equipment, and assets. For specific procedures on handling contaminated or previously contaminated property, refer to AFMAN 10-2602 Attachment 2. **NOTE:** If petroleum, oil, and lubricant (POL) products come into contact with the chemical warfare over-garment (OG), replace it. POL products will damage the OG even if contamination is not present maintenance personnel should wear rain suits or impenetrable

coveralls if there is a risk of exposure to POL products. It is important to note that rains suits will intensify the heat stress potential

2.5.10.2. Inspect malfunctioning vehicle for contamination markings and review AF Form 1800 for contamination data. Check vehicle registration number against contaminated vehicle listings. Check impervious vehicle surfaces and any pre-positioned M-8 paper if vehicle is not marked as contaminated. If vehicle is contaminated but not yet reported, mark vehicle for contamination, annotate contamination data on the AF Form 1800 and report vehicle contamination data to the LRS UCC.

2.5.10.3. Use barrier material between the technician and the vehicle at all times during maintenance of disabled vehicles in the field. If technicians are required to lie on the ground to perform maintenance, use plastic sheeting between them and the ground, as a safety precaution.

NOTE: If the vehicle is to be taken to vehicle management by wrecker, ensure contamination identification if needed. Identification cannot be overstated, it is critical to personnel protection.

2.5.10.4. Upon completion of mobile maintenance, carefully place all potentially contaminated barrier materials in plastic bags and mark as contaminated. Dispose of the materials at designated disposal sites. Soak any hand tools used for the mobile maintenance job in bleach solution for at least 30 minutes if possible before departure. If this decontamination process is not feasible in the field, separate any potentially contaminated tools in a plastic bag and soak them in bleach solution upon return to vehicle management.

Section 2B—Fight In-place Units

2.6. Fight In-place Units This section applies to units specifically established to fight-in-place. Guidance may also be applicable to some deployed location operations.

2.6.1. Training. In order to perform the vehicle management mission under fight-in-place conditions, units need to ensure all personnel are fully trained and qualified to perform all their war time tasks identified in the CFETP. If your unit mission dictates wearing MOPP gear, all assigned personnel must be trained and qualified to perform all required tasks in MOPP gear. You must be able to continue all operations under wartime conditions.

2.6.2. Operating Instructions. There are several critical areas that must be covered by your local Operating Instructions (OI's) for wartime operations. Provide guidance for using alternate locations in the event your facilities are destroyed or rendered unusable. OIs must also address post attack vehicle condition actions and mobile maintenance procedures.

2.6.3. Alternate Maintenance Facilities. If your maintenance facilities are destroyed you must have alternate locations. Consider the main shop, VM&A, Materiel Control, and your satellite locations to include Refueling Maintenance for possible alternate locations. Workable options may include a formal agreement with AAFES or MWR's Automotive Skills Development Center. Explore use of facilities assigned to other organizations in unit or on base.

2.6.4. Parts Support. Make arrangements for continued parts support if your shop is destroyed or damaged. Several possible options could be: cannibalization, putting wheels on your parts bins (so you can wheel them out of the damaged facility), overstock mobile maintenance truck with extra parts or establish robust adjusted stock levels at Base Supply.

2.6.5. Vehicle Management and Analysis. You must have an alternate location for your OLVIMS and AFIS. This means OLVIMS and AFIS must be set-up on a computer in one of the outlying locations prior to the contingency. You must also ensure that any outlying databases are backed-up frequently.

2.6.6. Management. It's a plus to your organization if you have the Vehicle Fleet Manager and Vehicle Management Superintendent work out of separate locations during contingencies. Managers shouldn't work or go anywhere together. It is extremely important that both individuals stay in contact with each other and stay well informed. Each should carry duplicate copies of personnel rosters, OIs, etc.

2.6.7. Bug-out Kits. If you have to relocate you need to be ready. You should have kits that are already packed and ready to go with all the essentials you require to operate in your alternate location.

2.6.8. Mobile Maintenance. You may need several mobile maintenance trucks depending on your operation, mission, location and threat. Your trucks may be tasked to set-up as a base of operations in an alternate location if your shop is destroyed. You must ensure your trucks are adequately set-up for any possible tasking.

Figure 2.5. Mobile Maintenance Truck.

2.6.9. Battle Damage Assessment. All assigned personnel must be familiar with vehicle battle damage assessment. They must be able to respond and assess vehicle damage caused by air and ground attacks. All battle damage assessments need to be reported through the appropriate channels and relayed to the wing leadership. Fast and accurate damage assessment is the key to critical decision making.

2.6.10. Vehicle Triage. Closely related to damage assessment, and done in conjunction with it, is vehicle triage. Based on MELs and any other guidance received from wing leadership, you should do triage as part of the damage assessment process. Triage is the process of assessing damage, putting the priority vehicles first, and doing cannibalization or whatever it takes to get those vehicles back in commission. TO 36-1-191 standards may be waived as necessary during active conflict. Field repairs may be the norm. Many a vehicle can still do its job without a fender or non-critical part/component. Refer to TO 36-1-181, *Battlefield Recovery/Evacuation & Repair,* for additional guidance.

2.6.10.1. Immediately after an attack, a post-attack vehicle operability (PAVO) assessment determines triage maintenance priorities. Sortie-generating vehicles assessed to be in a "Level A" triage

categories are attended to prior to repairing sortie-sustaining "Level A" vehicles. Contaminated vehicles will be reported to VM&A and the records documented.

2.6.11. Vehicle Dispersal Plan. You should have a vehicle dispersal plan developed and tested in advance for your vehicles. Your main shop is a big target. Collateral damage may affect vehicles parked in the area. Also, consider dispersing your mobile maintenance trucks and other key VM vehicles. Don't keep them together where one bomb, rocket or mortar shell could damage or destroy several at one time.

Figure 2.6. Towing an Inoperative Vehicle.

2.6.12. Hardening. Your base should have local guidance regarding hardening of facilities if you're at a fight-in-place location. Concentrate on protecting your critical assets, i.e., personnel, facilities, mobile trucks or equipment. Hardening guidance is also covered in **Chapter 2**, Section I of this handbook.

Section 2C—Convoy Operations

2.7. Convoy Operations. This section is designed to provide general guidance to vehicle maintainers involved in convoy operations. It does not take precedence over base or convoy commander policy. Each operating location will have specialized procedures for convoy operations. Convoy procedures in AFJMAN 24-306, *Chapter 24, Motor Marches and Convoys* must be adhered to.

2.7.1. All operators need to perform a visual inspection, prior to departure, of their vehicles prior to convoy operations. Inspections should include, but are not limited to, ensuring there is a serviceable spare tire on the vehicle, there are no leaks, tires are safe and serviceable, lug nuts are tight, jack and lug wrench are available, wipers/washers work, all fluid levels are within specifications, availability of tow bars/chains, etc.

Figure 2.7. Vehicle Operators Preparing for a Convoy.

2.7.1.1. Operators must also ensure the load carried by their vehicle is restrained properly prior to departure and during periodic halts. Inspections should include, but are not limited, to ensuring their load is properly strapped down, nothing is projecting from the sides or back, straps are not rubbing against sharp vehicle components, etc.

2.7.2. Mechanics assigned to perform maintenance duties during convoy operations need to ensure they have all tools and commonly used parts needed to perform roadside repairs. Tools and parts should be readily accessible to minimize downtime along the convoy route. Depending on the threat, disabled vehicles may be towed immediately instead of attempting roadside repairs. Before attempting roadside repairs, be aware that highway shoulders and surrounding terrain may be mined, contain Improvised Explosive Devices (IED) or have hostile enemy forces. Do not approach untested areas unless absolutely necessary. If entering an untested area check for suspicious items (protruding wires, UXOs, disturbed trash, etc.), signs of recent activity (unexplained digging, suspicious curb repairs, etc.) and indications of hostile forces (deserted area normally filled with Local Nationals).

2.7.2.1. Be cognizant of where spare tires, tow bars and chains are located throughout convoy. Ensure spare tires are available for all participating vehicle types. Be aware that some vehicles may be equipped with different size tires between front and rear axles.

2.7.3. The convoy commander determines where the mechanic is placed in the convoy. Normally the mechanic is placed towards the end where they can monitor all convoy vehicles as well as respond to any disabled vehicle without having to backtrack. All convoy mechanics must have a radio to maintain constant contact with the rest of the convoy.

2.7.3.1. The convoy commander must ensure a wrecker or some type of certified towing device is available if roadside repairs are not feasible. An extra truck tractor may accompany (on a trailer) some convoys. An extra tractor may minimize convoy downtime by enabling tow vehicle swap out.

2.7.3.2. Prior to the convoy deploying, the convoy commander must give a thorough briefing to all participants. At a minimum the briefing should include: a detailed description of the route to be used (to include maps for every vehicle), a description of the alternate route (to include maps), what to expect for weather/road/traffic conditions, the time frame the convoy should be on the road, what to do in case of vehicle break-down, what to do in case of traffic congestion and how to react if the convoy is attacked. The convoy commander should also make pre-arrangements with

the local authorities and inform them of the route they will be using and number of vehicles in the convoy. This may not apply in some locations due to security concerns.

2.7.4. The number of vehicles in a convoy element should not exceed 20–25. If there are more vehicles than that it may be difficult to maintain convoy integrity. The convoy commander could lose command and control. If there is more than one element to a convoy, the elements should be spaced-out from each other by a 40–45 minute interval. Barring any breakdowns by the first element, keeping a 40–45 minute interval should keep the convoy elements from potentially bunching up and becoming an inviting target.

2.7.4.1. Each convoy needs to have the appropriate signs/flags marking the lead and trail vehicles. The type/color of flags needed is identified in AFJMAN 24-306.

2.7.5. The convoy commander needs to ensure there are two-way radios placed throughout the convoy, with key vehicles being the lead and trail vehicles. Radios will enable the convoy commander to remain in contact with convoy personnel so he/she knows when problems occur.

2.7.6. Convoy commanders must ensure a “Hot Brake” check is accomplished approximately 1 mile from the point of embarkation. During this check all vehicle operators need to place their hands close to, but not on, the vehicle’s wheels to ensure they are not overheating. At the same stop operators must do a re-check of their loads to ensure they are still secure. Other periodic stops can be accomplished at the discretion of the convoy commander.

Figure 2.8. Vehicle Convoy.

2.7.7. If required on convoy, weapons should be maintained and functioned checked IAW guidance in **Chapter 2** of this handbook and AFMAN 10-100, *Airman’s Manual*. Weapons need to be readily accessible at all times during convoy operations. Ensure all ammunition is also readily available and on your person when exiting the vehicle unless local guidance states otherwise. Do not haphazardly store magazines throughout vehicle where they may shift to inaccessible locations or become contaminated with excessive dirt.

2.7.8. The convoy may also include gun trucks depending on the threat and local operating conditions. Gun trucks can be HMMWVs, 5-ton trucks or FMTVs (family of medium tactical vehicles) equipped with larger caliber or crew served weapons (.50 caliber machine gun, Squad Automatic Weapon, M-60 machine gun, grenade launcher, etc.). Gun trucks provide additional firepower and

suppression of enemy forces. Their operations are more flexible than normal convoy participants. Gun truck procedures will be briefed by the convoy commander.

2.7.9. If convoy comes under fire, indicate direction attack came from with turn signals. This will aid return fire from following vehicles. The driver should not look away from the direction of travel for more than 2 seconds at a time. The driver must avoid stopping or hitting disabled vehicles in the kill zone. Activate four-way flashers if someone in your vehicle has been injured. This will expedite casualty reporting and medical response at rally point. Provide head count, vehicle condition, weapons/ammunition status and any other important information to convoy commander at rally point or via radio if requested.

Section 2D—Forward Deployment.

2.8. Movement of Personnel, Vehicles, and Equipment. Forward deployment refers to moving personnel, vehicles and equipment from one forward operating location to new or captured bases.

Figure 2.9. Forward Deployed Vehicle Management Office.

2.8.1. Personnel: Vehicle management personnel already in theater may be tasked to forward deploy. Personnel selected for forward deployment need to meet the same requirements as listed in AFI 24-302 Chapter 2 if at all possible. They need to be fully equipped, trained and qualified for contingency operations.

2.8.2. Vehicles: The unit may have minimal response time to meet forward deployment taskings. New or captured bases may be operating with minimal support functions. It is imperative that the best vehicles and equipment are forward deployed. To ensure mission capability, the following vehicle shipment standards apply:

2.8.2.1. Perform an LTI and service all fluid systems. Vehicle must be safe and serviceable. Vehicle must be able to perform assigned mission with no or very minimal support. Vehicle will be shipped with serviceable spare tire.

2.8.2.2. Assemble TMSK with 30 day supply of available working/bench stock items. If time permits, purchase any vital parts or supplies not readily available. Include Technical Order (may require copying manual or shipping only available copy). See AFI 24-302 Chapter 2 for additional build-up and shipment guidance.

2.8.2.3. Secure OLVIMS data and spare keys in cab or operator's compartment. Shipping base should maintain copy of historical data until gaining location accepts and loads vehicle. If shipped data and/or keys are not readily visible, identify location with a prominently placed label.

NOTE: Contact NAF or host MAJCOM for guidance if unable to meet the above standards by the shipment deadline.

2.8.3. Tools and Equipment: Units may be tasked to forward deploy tools and equipment. Forward locations may be operating with minimal to non-existent support capability. It is imperative that the best equipment be sent to forward operating locations. The host MAJCOM or NAF should be queried about the availability of UTCs UFMXK and UFMXT for initial base set-up. Tailor equipment packages as appropriate if a UFMXK or UFMXT is en-route. Contact host MAJCOM, NAF or gaining unit for guidance on items needed at forward location.

Chapter 3

RECONSTITUTION

Section 3A—Personnel

3.1. Personnel redeployment guidance. Personnel redeployment guidance will be provided by NAF and host MAJCOM. Normally personnel are not released until replacements have been received and are mission ready. A draw down team may be created if your operating location is closing. Local leadership will provide drawdown/closure guidance.

3.1.1. Personnel reconstitution normally takes place back at home station. Reconstitution usually consists of accomplishing any required training. Training is designed to return a member to full mission effectiveness after a contingency or Major Theater War.

Section 3B—Vehicles

3.2. Redeployment. The host MAJCOM or NAF will provide shipment guidance. Some vehicles may be redistributed to steady state bases or sent to WRM locations. Ensure LTIs are accomplished on all vehicles tasked for redeployment. Ensure an adequate turn-in plan is developed for any leased vehicles.

3.2.1. It is vital to maintain 100% accountability of the vehicle fleet during base closure or drawdown actions. Hands-on inventory and/or aggressive coordination may be required with unit VCOs. Units may depart with vehicles or abandon them in place. Abandoned vehicles (GOV or Lease) may be in poor mechanical condition due to misuse or abuse. Failure to locate and process all assigned vehicles may delay personnel departure.

3.3. DRMS actions. Contact regional or zone DRMS manager for processing guidance after a vehicle has been approved for DRMS. Notify NAF or MAJCOM if unable to locate a regional or zone DRMS manager for your theater of operations. If DRMS representation is not able to assist with disposal, the MAJCOM or NAF will direct disposal IAW DOD 4160.21M, Chapter 8 Abandonment or Destruction (A/D). Some general guidance is listed below:

3.3.1. Property cannot be A/D without proper confirmation that necessary DEMIL has been completed and certified. DOD 4160.21M outlines DEMIL procedures and certification official criteria. Some A/D Officer and Witnessing Party guidance is listed below:

3.3.2. The A/D Officer may not be the accountable officer, responsible property officer or serve as a witnessing party to A/D actions.

3.3.3. The Witnessing Party shall attest to having observed actual accomplishment of A/D action. The witnessing party will normally not be involved in the receipt, classification, or accounting of property.

Figure 3.1. A Vehicle Awaiting DRMS Processing.

3.3.4. The accountable activity shall document all actions on, or attached to, DD Form 1348-1A. The 1348-1A will be used to credit the appropriate account. Refer to DOD 4160.21-M and **https://www.drms.dla.mil/drmsiw** for more guidance.

Section 3C—Equipment

3.4. Tools. Tools include computer systems used to support administrative, OLVIMS and AFIS functions. The host MAJCOM will provide guidance on the disposition of tools. Items may be used in-place, at other steady state locations or stored in WRM for future requirements. If your base is scheduled to close, request tool disposition instructions from MAJCOM or NAF.

3.5. Shop Equipment. The host MAJCOM will also provide guidance on the disposition of shop equipment. Shop equipment may be left in-place, redistributed to other bases or sent to WRM locations. If your base is scheduled to close, request equipment disposition instructions from MAJCOM or NAF.

3.6. Adopted and Prescribed Forms.

3.6.1. Forms adopted by this publication. DD Form 1149, **Requisition and Invoice/Shipping Document**, DD Form 1348-1A, **Issue Release/Receipt Document**, AF Form 601, **Equipment Action Request**, AF Form 1098, **Special Task Certification and Recurring Training**.

3.6.2. Forms prescribed by this publication. AF Form 1800, **Operator's Inspection Guide and Trouble Report**, AF Form 1823, **Vehicle and Equipment Work Order,** AF Form 1827, **Minor Maintenance Work Order,** AFTO 91**, Limited Technical Inspection – Motor Vehicle.**

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Attachment 1

GLOSSARY OF REFERENCES AND SUPPORTING INFORMATION

References

The following references are frequently used for establishing and operating an Air Force vehicle management shop:

Air Force Indices, Policy Directives, Instructions, and Manuals

AFIND13, Civilian Personnel Publications

AFIND18, Index of Air Force Manpower Standards

Air Force Education and Training Course Announcements (ETCA). **https://etca.randolph.af.mil**. {Formerly AFCAT 36-2223, USAF Formal Schools Catalog (Policy, Responsibilities, General Procedures, and Course Announcements)}

AFPD 21-3, Technical Order System

AFPD 24-3, Operation, Maintenance, and Use of Transportation Vehicles and Equipment Air Force

AFPD 32-70, Environmental Quality

AFPD 37-1, Information Management

AFI 10-201, Status of Resources and Training System (SORTS)

AFI 10-601, Capabilities Based Requirements Development

AFI 10-2701, Organization and Function of the Civil Air Patrol

AFI 23-106, Assignment and Use of Standard Reporting Designators (SRD)

AFI 23-111, Management of Government Property in Possession of the Air Force

AFI 23-201, Fuels Management

AFI 23-220, Reports of Survey for Air Force Property

AFI 23-226, CWDE Consolidated Mobility Bag Management

AFI 24-301, Vehicle Operations

AFI 24-302, Vehicle Management

AFI 25-101, War Reserve Materiel (WRM) Program Guidance and Procedures

AFI 25-201, Support Agreements Procedures

AFI 32-1024, Standard Facility Requirements

AFI 32-7001, Environmental Budgeting

AFI 32-7040, Air Quality Compliance

AFI 32-7045, Environmental Compliance Assessment and Management Program

AFI 32-7080, Pollution Prevention Program

AFI 32-7086, Hazardous Materials Management

AFI 33-110, Data Administration Program

AFI 33-360v1, Air Force Content Management Program--Publications

AFI 33-360v2, Content Management Program-Information Management Tool (CMP-IMT)

AFI 36-2101, Classifying Military Personnel (Officer and Enlisted)

AFI 36-2201v1, Training Development, Delivery and Evaluation

AFI 36-2201v2, Air Force Training Program Training Management

AFI 36-2201v3, Air Force Training Program On the Job Training Administration

AFI 36-2201v4, Managing Advanced Distributed Learning (ADL)

AFI 36-2201v5, Air Force Training Program Career Field Education and Training

AFI 36-2201v6, Air Force Training Program Total Force Training and Education Review Process (TFTERP)

AFI 36-2605, Air Force Military Personnel Testing System

AFI 36-2618, The Enlisted Force Structure

AFI 38-101, Air Force Organization

AFI 38-201, Determining Manpower Requirements

AFI 38-203, Commercial Activities Program

AFI 38-401, The Air Force Innovative Development Through Employee Awareness (IDEA) Program

AFI 63-124, Performance-based Service Contracts (PBSC)

AFI 64-117, Air Force Government-wide Purchase Card Program

AFI 65-106, Appropriated Fund Support of Morale, Welfare, and Recreation and Nonappropriated Fund Instrumentalities

AFI 65-501, Economic Analysis

AFI 65-601V1, USAF Budget Policy and Procedures

AFI 65-601V2, Budget Management for Operations

AFI 90-901, Operational Risk Management

AFI 91-202, The USAF Mishap Prevention Program

AFI 91-204, Safety Investigations and Reports (Chap. 12, Nuclear Mishap and Safety Deficiency Reportng)

AFI 91-207, USAF Traffic Safety Program

AFI 91-301, AFOSH Program

AFI 91-302, Air Force Occupational Safety, Fire Prevention and Health Program

AFMAN 10-2602, Nuclear, Biological, Chemical and Conventional (NBCC) Defense Operations and Standards

AFMAN 23-110, Standard Base Supply Customer’s Guide (Volume 2, Part 13)

AFJMAN 23-209, Storage and Handling of Hazardous Materials

AFJMAN 24-306, Manual for the Wheeled Vehicle Driver

AFMAN 37-123, Management of Records

AFMAN 65-506, Economic Analysis

AFPAM 24-317, Vehicle Control

AFPAM 32-7043, Hazardous Waste Management Guide

AFPAM 90-902, Operational Risk Management (ORM) Guidelines and Tools

AFPAM 91-216, USAF Safety Deployment and Contingency Pamphlet

AFH 32-1084, Facility Requirements

AFCSM 24-1, On-Line Vehicle Interactive Management System (OLVIMS)

AFMS 42B1, Air Force Manpower Standard Vehicle Maintenance

Air Force Records Schedule (RDS), **https://webrims.amc.af.mil**

Air Force Occupational Safety and Health (AFOSH) Standards

48-8, Controlling Exposure to Hazardous Materials

48-137, Respiratory Protection Program

91-5, Welding, Cutting, and Brazing

91-17, Interior Spray Finishing

91-20, Vehicle Maintenance Shops

91-25, Confined Spaces

91-38, Hydrocarbon Fuels, General

91-46, Materials Handling and Storage Equipment

91-66, General Industrial Operations

91-68, Chemical Safety

91-501, Air Force Consolidated Occupational Safety Standard

161-2, Industrial Ventilation

161-21, Hazard Communication

Department of Defense Regulations and Instructions

DODD 4500.36, Management, Acquisition, and Use of Motor Vehicles

DODI 4715.4, Pollution Prevention

DODI 7041.3, Economic Analysis for Decision making

DOD 4140.26-M, Defense Integrated Materiel Management Manual For Consumable Items

DOD 4500.36-R, Management, Acquisition, and Use of Motor Vehicles

DOD 5500.7-R, Joint Ethics Regulation

DTR 4500.9-R Part II and Part III, Transportation and Traffic Management

Allowance Standards

006, Organizational and Administrative Equipment

008, Civil Engineering Equipment

019, ALLMAJCOM Vehicle Support (Registered Fleet)

020-032, Individual MAJCOM Registered Vehicle Support

158, Worldwide Harvest Falcon and E-Falcon Pre-positioned Program Equipment (WRM Program)

159, Harvest Eagle Support System (WRM Program)

403, General Purpose Tools

457, Vehicle Management, Locomotive Maintenance and Vehicle Operations

Federal Acquisition Regulation, current edition

FAR 7.401, Acquisition Considerations

FAR 7.402, Acquisition Methods

FAR 45.304, Providing Motor Vehicles

FAR 45.310, Providing Agency-Peculiar Property

United States Code, (USC)

Title 10 USC, Section 2632, Transportation To and From Certain Places of Employment and on Military Installations

Title 31 USC, Section 1344, Passenger Motor Vehicle and Aircraft Use

Title 31 USC, Section 1349, Adverse Personnel Actions

Title 40 USC, Section 486, Policies, Regulators, and Delegations (GSA)

Title 40 USC, Section 491, Motor Vehicle Pools and Transportation Systems

Technical Orders

Master Nuclear Certification Listing, **https://wwwmil.nwd.kirtland.af.mil/mncl/default.asp**
(Formerly 00-110N-16)

Mission Workload Assignment System (D086), **https://www.msg.wpafb.af.mil/d086**
(Formerly 00-25-115)

Vehicle Management Index File, **https://sevpgm.robins.af.mil/vehicle/vmif/**
(Formerly TO 36A-1-1301)

00-5-1, Air Force Technical Order System

00-5-15, AF Time Compliance Technical Order System

00-5-18, USAF Technical Order Numbering System

00-20-1, Preventive Maintenance Program, General Requirements and Procedures

00-20-3, Maintenance Processing of Reparable Property and the Repair Cycle Asset Control System

00-20-14, AF Metrology and Calibration Program

00-25-113, Conservation, Segregation, and Disposal of Critical Alloys and Precious Metals

00-25-172, Ground Servicing of Aircraft and Static Grounding/Bonding

00-25-235, Safety Procedures and Equipment for Confined Space Entry

00-25-240, Uniform Repair/Replacement Criteria for Selected USAF Support Equipment

00-35D-54, Materiel Deficiency Reporting and Investigating System

33K-1-100-2-1, Calibration Requirement Summary Agenda

34-1-3, Inspection and Maintenance of Machinery and Shop Equipment

36-1-7, General Instruction and Preparation Checklist - AF Vehicle and Liquid Cooled Powered Ground Equipment Operation in Cold Weather Areas

36-1-27, USAF Vehicles, Materials Handling, and Construction Equipment

36-1-121, Standardization of Lunettes and Pintles (Tow Attachments)

36-1-181, Recovery and Battlefield Damage Assessment and Repair

36-1-191, Technical and Managerial Reference for Motor Vehicle Maintenance

36A-1-6, Installation of Seat Belts and Head Restraining Devices in Air Force Vehicles

36A-1-98, Towing Procedures - Trucks, Truck Tractors, and Passenger Carrying Vehicles

36A-1-1331, Liquid Propane Gas Conversion

36A-1-1341, Compressed Natural Gas Conversion

36C-1-4, Dielectric Testing of Insulated Aerial Manlift Devices

36Y4-1-171, Vehicles and Powered Ground Equipment Storage Batteries

36Y31-1-1, Removal of Rust and Sediment from Fuel and Oil Servicing Truck and Trailer Tanks and Application of Coating, Interior, Fuel and Oil Resistant

36Y32-1-142, Care, Maintenance and Repair of Pneumatic Tires and Inner Tubes

37A-1-101, Fuel, Water, and Lubricant Dispensing Equipment

38-1-5, Processing and Inspection on Non-mounted, Non- Aircraft, Gasoline and Diesel Engines (Except Gas Turbine and Marine for Storage and Shipment)

38-1-23, Inspection and Installation of Exhaust Spark Arrestors and Exhaust Purifiers on Non-Aircraft Engines

Abbreviations and Acronyms

ABO—Air Base Operability

ACF—Accounting and Finance

ACO—Administrative Contracting Officer

AEF—Aerospace Expeditionary Force

AEFC—AEF Center

AFEMS—Air Force Equipment Management System

AFI—Air Force Instruction

AFIS—Automated Fleet Information System

AFLC—Air Force Logistics Command

AFMAN—Air Force Manual

AFMS—Air Force Manpower Standard

AFO—Accounting and Finance Officer

AFOSI—Air Force Office of Special Investigations

AFPD—Air Force Policy Directive

AFS—Air Force Specialty

AFSS—Automated Fuel Service Station

AFSC—Air Force Specialty Code

AFWUS—Air Force World Wide UTC Summary

ALC—Air Logistics Center

API—American Petroleum Institute

APOD/E—Aerial Port of Debarkation/Embarkation

ARC—Air Reserve Components

ART—AEF Reporting Tool

AS—Allowance Standard

ASC—Allowance Source Code

ATOC—Air Terminal Operations Center

ATSO—Ability To Survive and Operate

AWP—Awaiting Parts

BEAR—Base Expeditionary Airfield Resources

BFMO—Base Fuels Management Office

BOI—Basis of Issue

BOS—Base Operating Support

BPA—Blanket Purchase Agreement

BSD—Battle Staff Directive

BSP—Base Support Plan

CA/CRL—Custodian Authorization/Custody Receipt Listing

CAMS—Consolidated Aircraft Management System

CARC—Chemical Agent Resistant Coating

CARS—Consolidated Analysis and Reporting System

CAT—Crisis or Contingency Action Team

CB—Chemical-Biological

CBRN—Chemical, Biological, Radiological and Nuclear

CCP—Casualty Collection Point

CDC—Career Development Course

CDF—Cargo Deployment Function

CDL—Commercial Drivers License

CDW—Collision Damage Waiver

CEMO—Command Equipment Management Office

CFETP—Career Field Education and Training Plan

CFR—Code of Federal Regulations

CHPMSK—Contingency High Priority Mission Support Kit

CMOS—Cargo Movement Operating System

CNG—Compressed Natural Gas

COB—Collocated Operating Base

COCESS—Contractor Operated Civil Engineer Supply Store

CONUS—Continental United States

COPAD—Contractor Operated Parts Depot

COPARS—Contractor-Operated Parts Store

COS—Chief of Supply

CRL—Cross Reference List

CSAF—Chief of Staff of the Air Force

CSC—Customer Service Center

CTK—Composite Tool Kit

DCAPES—Deliberate and Crisis Action Planning and Execution Segments

DCAS—Defense Contract Administration Service

DESC—Defense Energy Support Center

DIC—Document Identifier Code

DIFM—Due In From Maintenance

DLA—Defense Logistics Agency

DOC—Design Operational Capability

DOD—Department of Defense

DODAAC—Department of Defense Activity Address Code

DODAAD—Department of Defense Activity Address Directory

DP—Demand Processing

DRMS—Defense Reutilization and Marketing Service

DRU—Direct Reporting Unit

DSCC—Defense Supply Center, Columbus

EAID—Equipment Authorization Inventory Data

ECP—Entry Control Point

EDD—Estimated Delivery Date

EEIC—Element of Expense and Investment Code

EMS—Equipment Management Section

EO—Executive Order

EPA—Environmental Protection Agency

EPACT—Environmental Protection Act

ERRC—Expendability, Recoverability, Reparability Code

ESP—Emergency and Special Program

ETIC—Estimated Time In Commission

EWO—Emergency War Order

FAD—Force Activity Designator

FAE—Functional Area Evaluator

FAR—Federal Acquisition Regulation

FAS—Fuel Automated System

FASCAP—Fast Payback Capital Investment Program

FAST—Federal Automotive Statistical Tool

FM—Functional Manager

FOA—Field Operating Agency

FOL—Forward Operating Location

FOSSL—Follow-On Spares Support Listing

FPCON—Force Protection Condition

FSC—Federal Supply Classification

FSG—Federal Supply Group/Stock Group

FSS—Federal Supply Schedule

FTP—File Transfer Protocol

FW&A—Fraud, Waste & Abuse

GFE—Government Furnished Equipment

GMV—Government Motor Vehicle

GPC—Government-wide Purchase Card

GSA—General Services Administration

GSU—Geographically Separated Unit

GSE—Ground Support Equipment

GVW—Gross Vehicle Weight

HAZMAT—Hazardous Materials

I&S—Interchangeability and Substitutability

IAW—In Accordance With

IDIQ—Indefinite Delivery-Indefinite Quantity

IED—Improvised Explosive Device

IDO—Installation Deployment Officer

IDP—Installation Deployment Plan

IFMS—Interagency Fleet Management System

IG—Inspector General

IM—Item Manager

ISD—Instructional Systems Designer

ISSA—Inter-Service Support Agreement

ISSL—Initial Spares Support List

ISU—Issue

ITK—Individual Tool Kit

ITV—In-Transit Visibility

JCS—Joint Chiefs of Staff

JOPES—Joint Operations Planning and Execution System

JTR—Joint Travel Regulation

LDV—Light Duty Vehicle

LP—Local Purchase

LPG—Liquefied Petroleum Gas

LRC—Logistic Readiness Center

LRS—Logistics Readiness Squadron

LSV—Low Speed Vehicle

LTI—Limited Technical Inspection

MAJCOM—Major Command

MC—Materiel Control

MDR—Materiel Deficiency Report

MDV—Medium Duty Vehicle

MEL—Minimum Essential Level

MICAP—Mission Impaired Capability Awaiting Parts

MILSTRIP—Military Standard Requisitioning and Issue Procedures

MISCAP—Mission Capability

MO6—Vehicle Asset Listing

MOB—Main Operating Base

MOD—Mission Operating Directive

MOD—Mitchell On Demand

MOOTW—Military Operations Other Than War

MOPP—Mission-Oriented Protective Posture

MNS—Mission Needs Statement

MRA—Minimum Reserve Authorization

MRSP—Mobility Readiness Spares Package

MTT—Mobile Training Team

MVAC—Motor Vehicle Air Conditioner

NAF—Nonappropriated Funds

NAF—Numbered Air Force

NATO—North Atlantic Treaty Organization

NEO—Noncombatant Evacuation Operations

NHTSA—National Highway Traffic Safety Administration

NIIN—National Item Identification Number

NMC—Non Mission Capable

NMCM—Non Mission Capable Maintenance

NMCS—Non Mission Capable Supply

NPL—Non Price Listed

NSC—National Stock Class

NSN—National Stock Number

OA—Obligation Authority

OEM—Original Equipment Manufacturer

OGA—Other Government Agency

OI—Operating Instruction

OJT—On-The-Job Training

OLVIMS—On-Line Vehicle Interactive Management System

O&M—Operations and Maintenance

OMB—Office of Management and Budget

OPLAN—Operational Plan

OPM—Office of Personnel Management

OPR—Office of Primary Responsibility

OSI—Office of Special Investigation

OT&E—Operational Test and Evaluation

PAVO—Post Attack Vehicle Operability

P.L.—Public Law

PME—Precision Measurement Equipment

PM&I—Preventive Maintenance and Inspection

POC—Point Of Contact

POL—Petroleum, Oils and Lubricants

POS—Peacetime Operating Stock

POM—Programmed Objective Memorandum

PWS—Performance Work Statement

R&D—Research and Development

R&D—Reimbursable & Distribution

RC/CC—Responsibility Center/Cost Center

RCRA—Resource Conservation & Recovery Act

RCSE—Repair Cycle Support Element

RDD—Required Delivery Date

REC—Receipt

REMS—Registered Equipment Management System

RSS—Regional Supply Squadron

SAI—Sea And Air Interface

SATAF—Site Activation Task Force

SBSS—Standard Base Supply System

SDDC—Surface Deployment and Distribution Command

SECAF—Secretary of the Air Force

SITREP—Situation Report

SNUD—Stock Number User Directory

SORTS—Status of Resources and Training System

SOW—Statement of Work (SOW)

SPR—Special Requisition

SRAN—Stock Record Account Number

SRC—Survival Recovery Center

SRD—Standard Reporting Designator

STANAG—Standard NATO Agreement

TACOM—Tank-Automotive Command (U.S. Army)

TCN—Transportation Control Number

TCN—Third Country National

TCTO—Time Compliance Technical Order

TDY—Temporary Duty

TIN—Turn In

TMF—Traffic Management Flight

TMSK—Temporary Mission Support Kit

TO—Technical Order

TODO—Technical Order Distribution Office

TPFDD—Time Phased Force Deployment Data

TRIC—Transaction Identifier Code

UCC—Unit Control Center

UDI—U-Drive it

UDM—Unit Deployment Manager

UJC—Urgency Justification Code

UND—Urgency of Need Designator

U.S.C.—United States Code

UTC—Unit Type Code

UXO—Unexploded Ordnance

VAL—Vehicle Authorization Listing

VAMS—Vehicle Asset Management System

VCF—Vehicle Control Function

VCNCO—Vehicle Control Non-Commissioned Officer

VCO—Vehicle Control Officer

VCP—Vehicle Control Program

VEMSO—Vehicle and Equipment Management Support Office

VFM—Vehicle Fleet Manager

VIL—Vehicle Identification Link

VIN—Vehicle Identification Number

VIWG—Vehicle Improvement Working Group

VM&A—Vehicle Management and Analysis

VMF—Vehicle Management Flight

VMS—Vehicle Management Superintendent

VOS—Vehicle Operations Superintendent

WMP—War and Mobilization Plan

WOC—Wing Operations Center

WR-ALC—Warner Robins Air Logistics Center

WRM—War Reserve Materiel

Terms

Acceptance Inspection—An inspection performed on all new and used vehicles and equipment received on base, before placing them in service. This inspection shows the condition of the vehicle. Discrepancies noted on the AFTO 91 must be fixed before placing the vehicle in service if use of the vehicle would aggravate the problem or if the discrepancy creates a safety hazard.

Accessory—A part or assembly attached to or installed in a vehicle or piece of equipment; it is not essential to the operation or safety of the end item.

Accident Repairs—Repairs required as a result of collision. (In some instances, damage can be categorized as vehicle abuse or incident.)

Active Vehicle Storage—Storage of vehicles in an operational condition which permits their immediate deployment in the event of contingency or war and their use to support exercises.

Activity—A unit physically in existence, with personnel assigned.

AEF Reporting Tool (ART)— Used to report overall UTC status by color. **Green means go**. All identified personnel and equipment are available. All training has been completed. UTC is ready for deployment within 72 hours. **Yellow means Caution**. UTC is missing some capability that does not prevent meeting MISCAP and deployment. Identify specific causes in remarks section. **Red means No Go**. UTC is missing key capability and is not capable of fulfilling MISCAP. Red UTCs are not eligible for deployment. Identify specific causes in remarks section.

Aerial Port of Debarkation or Embarkation (APOD/E)—A military or joint-use airfield designated, equipped, and staffed for receiving, processing, and dispatching airlifted personnel and cargo.

Air Force Equipment Management System (AFEMS)—A standard system of equipment management that applies to all Air Force activities. It enables the Air Force to determine, authorize, account for, and report the types and quantities of equipment required to accomplish the Air Force mission. It is a primary basis for organizational equipment budget and buy programs.

Allowance Standard (AS)—An equipment allowance document which prescribes basic allowances of organizational equipment and provides the control to develop, revise, or change equipment authorization inventory data.

Average Hourly Labor Rate—The labor rate established locally (according to AFSCM 24-1) for use with OLVIMS documentation and DOD reporting.

Base Support Plan (BSP)—Used to assess base capability before, during and after wartime or deployment operations. Provides detailed information on unit responsibilities under those conditions.

Battle Staff Directive (BSD)—Directives issued from wing leadership. BSDs typically contain guidance on knock/chemical codes, MOPP procedures, operating requirements, duress words, etc.

Bench Stock—A stock of fast moving, parts and materials kept in the working area to speed vehicle repair. The stock does not normally exceed a 30-day supply.

Blanket Purchase Agreements, Requirements Contracts, and Services Contracts— Three types of recurring contracts awarded to local vendors which provide for a source of automotive parts at a fixed price. Established through coordination with Contracting.

Cannibalization—The authorized removal of a specific component or assembly from one item of equipment to install on another item of equipment.

Casualty Collection Point (CCP):— Centralized location where all casualties are transported to for initial care and triage. Local medical authorities will determine and publish primary and alternate CCP locations.

Co-utilization—A vehicle used by two functions within an organization, or two different units using the same vehicle on a part-time basis, during peacetime.

Collocated Operating Base (COB)—An active or reserve allied airfield designated for joint or unilateral use by US Air Force wartime augmentation forces, or for wartime relocation of US Air Force in-theater forces. COBs are not US bases.

Command Levy—A vehicle shipment tasking validated and assigned to a MAJCOM to effect shipment of a vehicle in support of an operational Air Force requirement. The command levy will include: Shipping instructions (destination, mark for addressee, shipment suspense date, routing, and mode of shipment), shipment preparation instructions, tech data needs and spare parts requirements.

Contingency High Priority Mission Support Kit (CHPMSK)—A vehicle spare parts kit for use in contingency environments. A CHPMSK can be developed before or after a deployment and tailored to exact fleet composition.

Corrosion Control—The treatment required to prevent or correct corrosion on vehicles and equipment. (Reference TO 36-1-191).

Cost Center Code—A code assigned to a function or unit, used to accumulate and distribute costs.

Cost-Reimbursement Contractor—Cost-reimbursement types of contracts provide for payment of allowable incurred costs, to the extent prescribed in the contract. These contracts establish an estimate of total cost for the purpose of obligating funds and establishing a ceiling that the contractor may not exceed (except at its own risk) without approval of the contracting officer.

Deficiency—A condition which prevents a vehicle from meeting its designed operational requirements.

Designed Operation Capability (DOC)—Outlines a unit's mission tasking and measurable resources. A unit is equipped and manned based on the DOC statement.

Direct Productive Labor Hour—A unit of time representing the productive effort of one person in one hour against a specific vehicle.

Direct Materials—Those materials which can be identified with a specific repair job.

Due In From Maintenance-(DIFM)—A repair cycle program in which the maintenance activity obtains a controlled item from SBSS and returns a similar item in either a serviceable, repairable, or condemned condition.

Emergency and Special Program (ESP)—Usually a two digit alpha numeric code, placed at end of fund cite, used to charge expenditures to a specific account. ESP codes are normally associated with contingency or disaster relief operations.

Emergency Vehicles—Vehicles designed and used to respond to situations that have caused or may cause injury or death or damage or destruction to property; for example, ambulances and fire trucks.

End Item—A final combination of end products; component parts, or materials which is ready for its intended use, e.g., ship, tank, mobile machine shop, aircraft or vehicle.

Estimated Repair Time—The usual number of labor hours needed to complete a specific repair job. Estimated repair time is either locally established or found in commercial flat rate manuals.

Expanded Mobile Maintenance—The capability to provide a dispersible mobile repair from mobile maintenance trucks to sortie-generating or other critical organizations.

Fair Wear and Tear—The deterioration of items attributed to normal usage.

Force Activity Designator (FAD)—A term denoting the operational importance of a weapon system, unit, activity, or project; it determines supply priority.

Forward Operating Base (FOB)—An airfield generally located closer to the enemy than main or collocated operating bases, used to support air operations without establishing full support facilities. The base may be used for an extended time period. Support by a main operating base will be required to provide backup support for a FOB. Also called forward operating location (FOL). See forward operations base in Joint Pub 1-02.

Functional Area Evaluator (FAE)—Replaced QAE. Responsible for contractor surveillance IAW contract Functional Surveillance Plan.

Gross Vehicle Weight (GVW)—The weight of a vehicle, including fuel, lubricants, coolant, on-vehicle tools and spares, cargo and occupants.

Hazardous Materials (HAZMAT)—Any material that poses a threat to human health and/or the environment. Typical hazardous materials are toxic, corrosive, ignitable, explosive or chemically reactive.

High-Cost Bench Stock—Parts or assemblies priced at $60 or more per unit of use.

Host—The major commander having jurisdiction over land and other real estate that provides tenants with facilities or services; also, an organization designated by the major command or by HQ USAF to furnish support.

Incident Damage—Damage occurring despite all reasonable precautions having been taken.

Indicators—Used to monitor the operation or condition of a management goal.

Indirect Labor—Labor which cannot be directly related to the repair of a specific vehicle (AF Form 1823) or item of equipment.

Indirect Materials—Parts and materials that cannot be identified to a specific vehicle (AF Form 1823) or item of equipment.

Indirect Nonproductive Labor Hours—Labor hours expended that do not represent a direct productive effort in the vehicle maintenance activity.

Installation Deployment Officer (IDO)—The host unit officer who maintains base deployment guidance and directs and coordinates base deployments under the direction of the installation commander.

Installation Deployment Plan (IDP)—Detailed plan describing how an installation accomplishes deployment. Normally contains specific cargo preparation requirements and UDM responsibilities.

Item Management—Selecting, acquiring, and maintaining materials, and controlling inventory.

In-Transit Visibility (ITV)—Describes extensive use of cargo tracking systems to determine location of cargo at any given time.

Joint Use (JU) Vehicle—A vehicle authorized to support a peacetime mission which has also been determined necessary to support an additive wartime requirement.

Latent Defect Clause—A contract clause covering failure of special vehicle components (except commercial design chassis) which result from defective materials or poor quality of work. (Reference TO 36-1-191).

Level A Storage—Vehicles stored in nonoperational status. Specific procedures for this level of storage are contained in technical order 36-1-191.

Limited Technical Inspection (LTI)— An inspection using AFTO Form 91, Limited Technical Inspection Motor Vehicle to determine the current condition of a vehicle or equipment item. (Reference TO 36-1-191).

Local Purchase—Acquiring a decentralized item of supply from sources outside the DOD.

Low Cost Bench Stock—Parts and assemblies priced at $59.99 or less per unit-of-use.

Low Speed Vehicles (LSV)—Commonly referred to as scooters, are defined as a 3-6 wheeled, self propelled utility vehicles that do not meet Federal Motor Vehicle Safety Standards, and are specifically designed for operation off of public roads and highways with a maximum speed of 25 MPH.

Main Operating Base (MOB)—A base on which all essential buildings and facilities exist.

Maintenance—All actions required to keep a vehicle or piece of equipment serviceable. This includes inspection, testing, servicing, repairing, overhauling, rebuilding, remanufacturing, cannibalizing, and reclaiming parts, accessories, and end items. This maintenance includes organizational, intermediate, and depot maintenance, plus the following:

1. Commercial Repair--Maintenance of vehicles or equipment accomplished by contract with an approved commercial organization on either a one-time or a continuing basis.

2. Delayed Maintenance--Maintenance that can be delayed without damage to the vehicle or a compromise of safety.

3. Interservice Maintenance--(other government agencies).Maintenance performed by one government agency for another.

4. Intra-service Maintenance--Maintenance performed by one organization, base, or station for another within the same governmental department or agency.

5. Mobile Service or Repair--Service or repair performed away from the vehicle management shop by a mobile maintenance unit equipped and staffed to provide this support.

6. Preventive Maintenance & Inspection (PM&I)--Periodic prescribed inspections or servicing of equipment, accomplished on a calendar, mileage, or hours-of-operation basis.

7. Recurring Maintenance--Maintenance required as a result of incorrect diagnosis, poor quality of work, design deficiency, operator abuse, ineffective quality control, or material failure.

8. Unauthorized Maintenance--Repair or service on civilian or nonappropriated fund vehicles; recurring repair or service on non-Air Force vehicles, except as covered by valid interservice agreements or contract provisions; or repair on an uneconomically reparable vehicle without proper approval.

9. Unscheduled Maintenance--Maintenance that is not scheduled but is required to correct deficiencies and to restore the vehicle or equipment to a serviceable condition.

Major Assembly—An assembly of component parts essential to the operation of the end item; for example, the engine, rear axle, transmission, and so forth.

Materiel or Quality Deficiency Report (MDR)—A report of material failure, equipment malfunction, design deficiency, or unsafe or otherwise unsatisfactory condition. (See TO 00-35D-54 and TO 36-1-191.)

Maximum One -Time Repair Allowance—The maximum amount of money that can be expended at any one time for repairing a vehicle or item of equipment. (Reference TO 36-1-191)

Mission Capability (MISCAP)—Description of what a UTC package (personnel or equipment) must be capable of performing at a deployed location.

Mobility Coded Vehicle—Vehicles and vehicular equipment required to be moved with a unit or special activity upon deployment to an emergency or wartime situation.

Mobility Readiness Spares Package (MRSP)—An air transportable package of war reserve materiel spares, repair parts, and related maintenance supplies required to support planned wartime or contingency operations of a weapon or support system for a specified period of time pending resupply. MRSP may support aircraft, vehicles, communications systems, and other systems as appropriate.

Modification—A change in the configuration or functional characteristics of a system or item of equipment.

Motor Vehicle—Any item of equipment mounted on wheels or tracks that derives motive power from a self-contained power unit, or is designed to be towed by and used together with such self-propelled equipment.

Obsolete Vehicle—A vehicle declared obsolete by the item manager because of age or design.

Operational Plan (OPLAN)—A detailed, written plan used to execute a military operation.

Overhaul—The restoration of an item to a completely serviceable condition as prescribed by a maintenance serviceability standard.

Parts Provisioning—Initial vehicle parts identified for purchase from the manufacturer at the time of vehicle procurement in sufficient quantities to support the expected life of the vehicle. Provisioning also includes additive spares required for contingency support requirements based on MAJCOM requirements at the time of acquisition.

Post-Attack Vehicle Operability (PAVO)—A post-attack vehicle assessment of damage to rapidly determine maintenance priorities in the post attack period. Using the triage maintenance concept, vehicles with the highest priority and needing the least amount of repairs are returned to service soonest.

Prepositioned Vehicle—A vehicle procured and placed in an overseas location as war readiness materiel (WRM) to reduce critical airlift requirements during contingencies.

Preventive Maintenance & Inspection (PM&I)—A planned inspection accomplished at regular intervals of calendar time, miles or hours of operation. (Reference TO 36-1-191)

Priority Designator—A two-digit issue and priority code (01 through 15) placed in military standard requisitioning and issue procedure regulations. The priority designator is based on a combination of factors which relate the mission of the requisitioner and the urgency of need or the end use. It provides a means of assigning relative rankings to the competing demands placed on the DOD supply system.

Priority Maintenance—The maintenance effort to expedite a vehicle through the shop when the using organization is at or below its minimum essential level (MEL).

Qualification Training—Actual hands-on task performance training designed to qualify an individual in a specific duty position. This portion of the dual channel on-the-job training program occurs both during and after the upgrade training process. It is designed to provide the performance skills required to do the job.

Quality Assurance—Those actions taken by the government to assure that services meet the requirements in the statement of work.

Reclamation—The dismantling or disassembly of an end item for the purpose of converting serviceable components into active inventory.

Registered Equipment Management System (REMS)—A system of managing the inventory of Air Force vehicular equipment.

Registered Vehicle—A vehicle assigned a USAF registration number.

Repair Cycle—The stages through which a repairable item passes from the time of its removal or replacement until it is reinstalled or placed in stock in a serviceable condition.

Replacement Code—A code assigned to a vehicle that designates its eligibility for replacement. (Reference TO 36-1-191.)

Requirement—A need or demand for personnel, equipment, supplies, facilities, or services expressed in specific quantities for specific periods and time.

Sea and Air Interface (SAI)—A military or joint-use airfield designated, equipped, and staffed to load and dispatch personnel and cargo arriving by sea which requires further movement by intratheater airlift.

Serviceability Standard—The standard a vehicle must meet or surpass to be satisfactory for operation.

Situation Report (SITREP)—Used to report unit status and concerns to higher headquarters.

Standard Price—The unit price of an item listed on the appropriate Air Force stock list. Stock list changes, including the price, are distributed through the Stock Number User Directory (SNUD) system (DO71) to Air Force bases.

Status of Resources and Training (SORTS)—Automated data system used to report current status of military forces. Used by higher headquarters to determine unit capability. SORTS information is classified.

Supply Point—Any point where supplies are issued in detail.

Technical Assistance—The providing of advice, assistance, and training pertaining to the installation, operation, and maintenance of equipment.[Services provided to Air Force activities' vehicles and equipment by the support air logistics center or the mobility service offices (MSO), on a reimbursable basis.(Reference TOs 00-25-107 and 00-25-122.)]

Technical Order—An Air Force publication that gives specific technical direction and information for inspection, storage, operation, modification, and maintenance of Air Force motor vehicles.

Temporary Mission Support Kit (TMSK)—A predetermined generic list of fly-away spare parts that units with deployment vehicles must requisition, mark, and box to ship with each vehicle prior to its departure. The kit is designed to support a vehicle for 30 days.

Tenant—(on base or a supported installation)-Any US Armed Forces or foreign organization, unit, or activity that occupies real property under the jurisdiction of a host command or that occupies real property under its own jurisdiction but requires support from another Air Force installation in the same locality. A tenant may belong to the same command as the host organization.

Time Compliance Technical Order (TCTO)—An authorization directive issued to provide instructions to Air Force activities for accomplishing one-time changes, modification, inspection of equipment or installation of new equipment.

Time Phased Force Deployment Data (TPFDD)—Deployment listing of cargo and personnel. Key document for deploying units or organizations expecting inbound forces and equipment. Shows UTCs, arrival dates, departure dates, unit information, etc. The TPPDD is classified.

Transient Vehicle—A vehicle belonging to an Air Force activity or other government agency and not officially assigned, to your base, for maintenance or operational support by coordinated agreements.

Transportation Control Number (TCN)—Generated by LOGMOD and used to positively identify and track cargo.

Triage Maintenance—An immediate, temporary repair of a battle damaged vehicle during post attack recovery operations in order to support the immediate ongoing mission. Vehicle repair requirements are placed in one of three condition levels:

1. Level A. Immediately returnable to service with minimal or only minor repair.

2. Level B. Repairable, requiring more than 30 minutes of repair work but less than 4 hours.

3. Level C. Repairs will take over 4 hours, or vehicle not repairable at all.

Uneconomically Reparable—A vehicle or piece of equipment whose one-time repair estimate exceeds the one-time repair allowance or whose age or mileage life expectancy has been attained. (Reference TO 36-1-191.)

Unit Type Code (UTC)—A five character alphanumeric code that uniquely identifies deployment package. A UTC can consist of personnel, vehicles and/or equipment.

Urgency of Need Designator—A term accompanied by a capital letter (A through C) which establishes the necessity for the acquisition of a resource. Urgency of need designators are used in conjunction with the assigned force activity designators (FAD) to establish a position resource demand based on mission importance and the pressure of necessity.

Urgency of need A-represents a compelling necessity, the lack of which has caused or will cause a mission failure. (Commanding officers must authenticate all urgency of need A demands.)

Urgency of need B-denotes a need which has or will cause mission impairment.

Urgency of need C-represents those resource requirements needed sooner than routine handling will permit.

USAF Management Code—A code assigned to a vehicle for identification purposes.

Vehicle Abuse—Damage caused by neglect or willful acts of improper operation or care.

Vehicle Control Program (VCP)—The management control functions established for those base activities with assigned vehicles on recurring dispatch. (Reference AFI 24-308.)

Vehicle Design—Vehicles are of two basic designs:

1. Commercial Design. A vehicle designed by the manufacturer as a production model for commercial sale and usage. It is built to the manufacturer's specifications and is purchased by the Air Force without

major changes. Examples are sedans, station wagons, pickup trucks, material handling equipment, and so forth. These vehicles are assigned a B, C, D, or E designator in their registration numbers.

2. Military Design. A vehicle having military characteristics resulting from military research and development processes, designed primarily for use by forces in the field in direct connection with or support of combat or tactical operations. These vehicles are assigned a K, L, or M designator in their registration numbers.

Vehicle or Equipment Equivalent—A unit of measure denoting the maintenance complexity of a vehicle or item of equipment.

Vehicle Fleet Manager (VFM) and Management Superintendent (VMS)—Individuals charged with managing the vehicle management activity.

War Reserve Materiel (WRM) Vehicles—Those vehicles required in addition to peacetime vehicles which provide support for forces, missions, and activities listed in US Air Force war plans.

Warranty—A vendor guarantee against defective parts or workmanship for a specified period of time. (Reference TO 36-1-191).

Winterization—Prepping a vehicle for cold weather operation. (Reference TO 36-1-7).

Work Center—A separate section within vehicle management that performs service, repair, administrative, or support functions.

Work Order—A specific or blanket authorization to perform certain work.

Attachment 2

VEHICLE MANAGEMENT CONTINGENCY BEDDOWN CHECKLIST

A2.1. This attachment is designed to assist deployed maintenance personnel establish operations at a contingency, bare or austere base.

A2.2. Contact on-site Logistics Plans for specific arrival instructions.

A2.3. Develop list of all assigned VM personnel.

A2.3.1. Does it include after duty hours location information?

A2.3.2. Provide key Vehicle Management personnel list to Logistics Plans and MPF.

A2.4. Ensure shop facility and equipment UTCs, if required, are on-hand.

A2.4.1. Does your location need contingency maintenance facilities?

A2.4.2. If so, check shipment status of UTC XFBTD, BEAR Base VM facility kit.

A2.4.3. Does your location require an initial equipment stand up kit?

A2.4.4. If so, check shipment status of UTC UFMXK (Transportation VM Support Kit).

A2.4.5. Is your location projected to remain open for more than 30 days?

A2.4.5.1. If yes, request UTC UFMXT (Vehicle Maintenance Heavy Support Kit).

A2.5. Site and establish vehicle management facilities.

A2.5.1. Are they adequate (size, water, power, lighting, structurally sound)?

A2.5.2. Do they allow for a physically separated refueling vehicle maintenance shop?

A2.5.3. Does location provide acceptable access to supported operations?

A2.6. Site and construct bunkers and defensive fighting positions if required.

A2.6.1. Are bunkers able to accommodate all personnel during shift change?

A2.6.2. Are bunkers dispersed to minimize casualties?

A2.7. Establish primary and alternate rally points.

A2.7.1. Do rally points provide protection for personnel, if possible?

A2.7.2. Is everyone aware of primary and alternate rally point locations?

A2.8. Break-out supplies and equipment. Get inventory control or status if still en route.

A2.8.1. Will on-hand supplies enable repairs to meet the required level of maintenance?

A2.8.2. Have accountability procedures been established?

A2.8.3. Has secure storage been acquired?

A2.9. Stand-up Vehicle Management and Analysis Section.

A2.9.1. Is OLVIMS up and running?

A2.9.2. Is AFIS up and running?

A2.9.3. Are all required forms on hand?

A2.9.4. Has manual PM&I tracking been initiated, if required?

A2.10. Stand-up Materiel Control Section.

A2.10.1. Have MRSP and TMSK spares been inventoried and organized for use?

A2.10.2. Do you know the MAJCOM procedures for resupply?

A2.10.3. Has contact been established with supporting RSS?

A2.11. Contact contingency contracting officer.

A2.11.1. What types or services/support is available in the local area?

A2.11.2. Are BPAs necessary and are they established for immediate use?

A2.11.3. Have BPAs been established with internet commercial parts sources, as required?

A2.12. Establish hours of operation and determine shift manning.

A2.12.1. Is manpower mix adequate to support mission?

A2.12.2. Will duty hours support wing operations?

A2.12.3. Has stand-by maintenance been established?

A2.13. Establish reporting channels to pass information or identify problems to host MAJCOM.

A2.13.1. Are phones, internet, e-mail and fax capability available?

A2.13.2. Is SIPRNET (classified) e-mail available if needed?

A2.14. Establish Technical Order and publication library.

A2.14.1. Are required publications on hand and organized for use?

A2.14.2. Has higher headquarters been notified to fill shortages?

A2.14.3. For emergency/immediate need tech data contact AF VEMSO @ https://www.vemso.hq.af.mil

A2.15. Determine type of fuel used on base.

A2.15.1. Is it JP-8?

A2.15.2. If so, had the lubricity additive been added?

A2.15.3. If not, is POL aware of the additive's importance and are they pursuing purchase?

Attachment 3

CONTINGENCY OLVIMS GUIDE

A3.1. This guide was developed to assist a vehicle management shop which has OLVIMS responsibility but does not have a maintenance controller assigned. It can also be used by less experienced maintenance controllers filling one-deep positions. It is not designed to be all inclusive, only to give you basic information to function within OLVIMS and ensure VM&A responsibilities are being accomplished. Use this guide along with AFI 24-302, AFCSM 24-1 and TO 36-1-191. Where appropriate, references will be provided in each topic area to obtain additional information and guidance. Required references should have been deployed on disk with each 2S, 2T3X7, 2T370, 2T390 and 2T300.

A3.2. Accountability. It is imperative that accountability be established for the vehicles and equipment you are responsible for. In a contingency situation vehicles are deployed and re-deployed. Procedures must be in place to ensure the vehicles are being accounted for. This includes knowing if the vehicle is permanently assigned or TDY to your location. If the vehicle is TDY, records should have accompanied it and you should know the home station of that asset. If the origin of the vehicle is unknown, contact higher headquarters to determine where the vehicle is assigned. For example in Southwest Asia, you would contact CENTAF or ACC.

A3.2.1. If you have to perform maintenance on a TDY vehicle, the proper procedure is to forward all the maintenance data to the owning unit. Again, if you do not know the owning unit, the information should be forwarded to higher headquarters for assistance.

A3.2.2. Instructions for processing transient vehicles are included in the work order processing section of this guide.

A3.3. Starting OLVIMS. If there is an OLVIMS site loaded where you are deployed to, there are a few things that have to be in place before a work order can be initiated. This is primarily for new vehicles being assigned to the site. If there isn't a site already established, these procedures will have to be done after the site is established. **NOTE:** Do not attempt to establish an OLVIMS site on your own. Contact higher headquarters for assistance.

NOTE: If the vehicle is TDY to your location then see the procedures under processing work orders for transient vehicles.

A3.3.1. If the vehicle is new to the site there are at least four things that must be accomplished before a work order can be opened:

A3.3.1.1. Load Org Codes. Before a new vehicle can be loaded into OLVIMS, there must be an organization code to assign the vehicle to. See AFCSM 24-1, para 5.2.23 for instruction on loading organizations into your site.

A3.3.1.2. Loading Vehicles. Once the organization codes are loaded the vehicle can then be loaded into OLVIMS.

A3.3.1.2.1. The transactions required to load a vehicle into OLVIMS are the:

A3.3.1.2.2. AZ: Used to load a vehicle into OLVIMS. It is also used to change data.

A3.3.1.2.3. BZ: Used to establish/change scheduled maintenance intervals.

A3.3.1.2.4. CZ: Used to load/change static data about the vehicle such as VINs, Model Numbers, and Keys codes. It also maintains a record of transfer and TCTO information about the vehicle.

NOTE: See AFCSM 24-1, Chapter 5 for instructions for using these transactions.

A3.3.1.3. Loading Employees. Now that the vehicle is in OLVIMS, before a work order can be opened there must be employees loaded to work on that vehicle.

A3.3.1.3.1. Use the DZ transaction to load employees into OLVIMS.

NOTE: See AFCSM 24-1, Chapter 5 for instructions for using this transaction.

A3.3.1.4. Loading Work Centers. The last thing that must be done prior to opening a work order is to establish work centers in your OLVIMS site. You can have multiple work centers or just one. This is determined locally and will depend on the size and makeup of your shop.

A3.3.1.4.1. Setting up work centers is done using the WC or WT transactions. These are covered in AFCSM 24-1, para. 5.3.30.4

A3.3.2. Transferring Vehicles. In a contingency or deployed environment, transferring vehicles between locations may happen much more often than it would at a CONUS location. When you receive instructions to ship a vehicle, it needs to prepared IAW AFI 24-302 and TO 36-1-191. Copies of the records must be sent with the vehicle and the vehicle should be dropped from your OLVIMS database.

A3.3.2.1. Use the AX transaction to transfer the vehicle off-site. The AX transaction can be found in AFCSM 24-1, para 5.3.11.4.

A3.3.2.2. Use the AT transaction if a vehicle is going to be transferred to another unit on base. This transaction is in para 5.3.11.3.

A3.3.3. Work order processing. Opening and closing work orders will be the majority of the work that you will do in OLVIMS. It is important to understand the different types of work orders and what each are used for. The work order prefix indicates the type of work order. See AFSCM 24-1, attachment 4 for a complete list of work order prefixes. Here are a few of the most common:

A3.3.3.1. “B” - Unscheduled maintenance, abuse and accident estimates.

A3.3.3.2. “F” - Accidents, PM&I, contract maintenance, transient vehicles and Other Government Agencies.

A3.3.3.3. “S” - Service Bulletins

A3.3.3.4. “T” - TCTOs

A3.3.3.5. “W” - For transient vehicle returned to the home base

A3.3.3.6. “Z” – Warranty

A3.3.4. Open/Close Work Orders. Once you have determined that a vehicle needs a repair work order, you will need to open the work order in OLVIMS. Recommend using a worksheet in customer service to list the registration number, miles/hours, jobs and estimated labor hours including any time taken for the in-check of the vehicle.

A3.3.4.1. Enter "WW" at the OLVIMS main menu. You will be prompted to enter the registration number of the vehicle. If the vehicle is loaded in the system, all the static data should appear on the "WW" screen once the registration number is entered. If it is a transient vehicle you will have to enter a 5000 management code.

A3.3.4.2. Enter the current miles/hours. If the current mileage/hours is out of range of what OLVIMS thinks it should be, you will be asked if the mileage/hours reading is correct. Recheck the miles or hours before submitting the mileage reading. Mileage/hours has a huge affect on scheduling and entering the wrong mileage plays havoc with your scheduled maintenance plan.

A3.3.4.3. After the mileage/hours are entered, enter the work center, date/time opened and priority. At this point you will need to enter the correct work order prefix. The default is "B" for unscheduled maintenance. If you selected PM&I, the prefix will automatically change to "F". Select an option from the bottom of the screen or just enter the appropriate code for the work required.

A3.3.4.4. Now you will enter the jobs for the work order. Press F5 and enter the jobs. If you added PM&I from the opening screen you will have to enter the estimated labor hours for each of the PM&I jobs. After the PM&I jobs, if added, enter the next system code required. Follow the screen prompts for the correct codes. Enter the labor hours then move on to the next job. When you are done press F2 to print the work order. Press F3 if there are less then 10 jobs and you wish to print page two as well. This is recommended for PM&I or when you think there may be additional jobs that have not been identified at this point. Forward the work order to the appropriate shop and keep track of the status in the control board.

A3.3.5. Transient Vehicles

A3.3.5.1. TDY to Your Location:

A3.3.5.1.1. Open the work order using a 5000 management code, indicating a transient vehicle. Process the vehicle for repair and close out the work order when complete. A PCN 19, Transient Vehicle Return Report, will be generated by OLVIMS after the workorder is closed out. This report will be sent to the home station VM&A for input into their OLVIMS data base.

A3.3.5.2. If your base is the home station:

A3.3.5.2.1. You may have vehicles deployed from your location to another deployed location. If this is the case you should receive the PCN 019 from the base that performs the repairs and process a "NZ" transaction to record the labor hours, cost data and PM&I actions. Refer to AFCSM 24-1, para 5.3.21 for instructions on processing an "NZ" transaction.

A3.3.6. **Minor Maintenance.** Minor Maintenance is work that can be done on a vehicle in less the two hours and requires less than $60.00 in parts. Minor Maintenance is documented on an AF Form 1827 and input into OLVIMS using a "GZ" transaction. See AFCSM 24-1, para. 5.3.17

A3.3.7. Status. Once the work order is open you will be able to monitor the status of the vehicle through out the shop. Including updating ETICs, changing work centers and updating the remarks to indicate major repairs.

A3.3.7.1. To access the control board press ALT + F2 at the same time. This screen will give you an overview of what is in each shop and your NMC by work center and a total for the shop.

A3.3.7.1.1. When a work order is opened or taken off Not Mission Capable Supply (NMCS) it will automatically be assigned an "A" status for awaiting shop. When a vehicle is put on NMCS it will show a "V" status for NMCS. To update the status to "I" for in-shop, you will press F4 and enter the registration number. At this point enter the ETIC date and time, work center, status, remarks and priority. The work center, remarks and priority only need to be updated if there is a change.

A3.3.8. ETICs should be updated as often as the VFM deems necessary. Depending on the size of your fleet and the number of inquiries you receive during the day, a good rule of thumb is twice a day or when there is a significant change.

A3.3.8.1. There are a number of ways to determine the ETIC for the shop. The best way, in terms of customer service, is to ETIC the entire work order, not just the jobs for the shop it is currently in. For example, if the vehicle comes in for PM&I, body work and tires you will have to determine the ETIC based on the estimated labor hours for the entire work order, the work load in each of the shops and the availability of mechanics. This should give you an ETIC that will tell the customer when they are getting their vehicle back as apposed to when a particular work center will be done with it.

A3.3.9. Yard Checks. Press F6 to access the yard check function. This will allow you to print out a Yard Check listing to aid with completing your weekly yard checks (Frequency determined by host MAJCOM).

A3.3.9.1. Place an "X" next to the vehicles you want on your listing and then select the sort order. Recommend by registration number. The work center option can be difficult to work with because vehicles tend to get moved without being updated in the OLVIMS control board.

A3.3.10. Minimum Essential Levels (MEL). MELs are used to determine whether or not a vehicle will need a priority when it comes into the shop. The MEL should be organized by using organization and management code. Each unit will determine their minimum level that they can operate with, by management code. If a vehicle comes into the shop and it puts the unit below their MEL, then you may put a priority on the vehicle. If there are other vehicles on base that can meet the need on a temporary basis then the vehicle causing the unit to fall below MEL would not necessarily receive a priority.

A3.3.10.1. MELs can be loaded into OLVIMS. If an opened work order will cause a unit to fall below MEL then OLVIMS will pop up a message. If you have an MEL and wish to load it into OLVIMS, refer to the "OE" and "OF" transactions in AFCSM 24-1.

A3.3.11. OLVIMS Processing. Parameter transactions are used to start and end daily and monthly processing in OLVIMS. There are three parameter transactions that you will deal with on a regular basis. They are the "YJ", Daily Parameter, "YK", Monthly Parameter, and the "YB", End-of-Day/ Month Parameter.

A3.3.11.1. Daily Parameter. When you start OLVIMS, you will see an opening screen that will display information about your system including the site code for your site. If there is a "Y" next to your site code then there is a parameter set up for your site already. If not, then you will have to set one up. For daily processing you will need to enter "YJ".

A3.3.11.1.1. Enter the date processing as of date. This should be the current date.

A3.3.11.1.2. Then enter the day of the week ID. This will be a number from 1-5, corresponding to the day of the week. 1 is for Monday, 2 is for Tuesday, etc. If you are working on Saturday and/or Sunday then the parameter must be pushed forward to the following Monday. You can still process on the weekend, but every place a date needs to be entered will have to be changed to the current date. OLVIMS date fields default to the parameter date, but most of them can be changed.

A3.3.11.1.3. All other information should remain the same. Press F3 and you are ready to process.

A3.3.11.2. Monthly Parameter. On the first day of a new month you will have to process a "YK" parameter. This sets OLVIMS up to begin processing in a new month. This also puts OLVIMS into "Dual Month Status" which allows you to process both in the current month and the previous month until the previous month is ready to be closed out.

A3.3.11.2.1. The only difference with the "YK" is that you will have to enter available Labor Hours for the month. This is calculated by multiplying the number of work days in the month times the number of work hours in the day. For example, if there are 20 work days in the month and you work an 8 hour day, the available hours for the month will be 160. That is 160 hours per employee.

A3.3.11.2.2. Do not change any of the other information unless necessary. Press F3 and OLVIMS will be ready to process another day.

A3.3.11.3. End-of-Day Processing. At the end of a processing day you will need to run a "YB" transaction. The "YB" closes out the processing day and will create reports.

A3.3.11.3.1. Enter "YB" from the main menu. Do not enter anything in the monthly processing box, unless you are closing out the previous month. That will be explained later. Enter a "Y" in the boxes for the listings you wish to have created during the end-of-day processing. Do not select PCNs 28, 29, 32 or 115. These are monthly reports and are only selected during the end-of-month processing.

A3.3.11.3.2. Press [ENTER] at the select next transaction box and the end-of-day will begin to process. Ensure you have a disk available to back up the daily transactions. OLVIMS will prompt you to do this.

A3.3.11.3.3. Once the end-of-day processing is complete you will need to enter a new daily parameter to begin the next day's processing. If you wish to do this at the end of the day, you will need to put the next day's date in the processing as of date field.

A3.3.11.4. End-of-Month Processing. Before processing the end-of-month, there are a number of things that must be accomplished. All parts, labor hours, fuel, etc should be input into OLVIMS before closing the month. See AFI 24-302, chapter 4, for all actions to complete prior to closing the month.

A3.3.11.4.1. End-of-Month processing is begun with a "YB" transaction as well. The only difference here is that you will enter a "Y" in the Monthly Processing block and select the four monthly reports: PCN 28, 29, 30 and 115.

A3.3.11.4.2. Daily processing will begin first and then OLVIMS will go right into the monthly processing.

A3.3.11.4.3. There will be three files that need to be copied to floppy disk; the accounting and finance file, AFIS and the Monthly Backup.

A3.3.11.5. Quarterly Processing. Quarterly processing will begin if you are processing the last month in a quarter. For example if you are closing out September, then after the monthly processes then the quarterly will begin for the 4th quarter of the FY. Follow the screen prompts for backups the same way you would for monthly processing.

A3.3.11.6. MAJCOM Requirements: Depending on what AOR you are assigned to there may be various reporting requirements for the month/quarter. Contact higher headquarters to find out what information (Report/Data) is required and include this in your continuity book.

A3.4. VIMS Files. Part of your daily OLVIMS processing will include uploading parts and fuel transactions. VIMS File processing is described in AFCSM 24-1, para 5.3.6 and 5.3.7.

A3.5. Parts. If you are purchasing parts with a GPC or other contract method you will simply enter the parts into OLVIMS using a "PZ" transaction. Refer to AFCSM 24-1, para 5.3.24 for details on how to enter parts transactions using the "PZ".

A3.5.1. If you are receiving parts from supply you should be able to access your D22 file from the RSS web site. You may have to request access to the RSS site before you are able to download the file for upload into OLVIMS. Once you find your site on the RSS reports page, you should find two files. One file will contain a report of the parts purchased from the previous day and the other file will be formatted for uploading into OLVIMS.

A3.5.1.1. The file for uploading will have to be renamed to ?RAVIM.DAT. The "?" is your site code. Upload the file using the "TE" transaction. This will move the file to OLVIMS. Use the "TC" transaction to apply the transactions to the database using option number 7.

A3.5.1.2. If you are unable to get the D22 file from supply, then supply purchases can still be entered into OLVIMS manually by using the "VZ" transaction. Refer to AFCSM 24-1, para 5.3.29.2.

A3.6. Fuel. If your base is using SBSS and the Fuel Accounting System (FAS) to record fuel purchases then you would need to download those transactions from FAS and upload them into OLVIMS the same way the parts transactions are uploaded. Rename the FAS download to ?FAMS.DAT then upload into OLVIMS using the "TE" transaction and process the transactions into OLVIMS using the "TC" transaction.

A3.6.1. If your base uses FAS and you do not have access, you will need a logon and password to access the fuel transactions for your site. Information for obtaining a logon can be found at: **https://www.feshub.desc.dla.mil/ehub/webtool/login.htm**.

A3.6.1.1. Chances are if you are at a deployed/contingency location there will not be any automated fuel tracking, but the vehicles will need to get fuel from somewhere. Work with fuels to determine if there is a way to capture fuel usage for the vehicles. For example; is fuel being metered from a bulk source? Does anyone keep track of how much fuel is being given out and can that information be forwarded to Vehicle Management for input into OLVIMS?

A3.6.2. If you are able to capture the fuel usage by vehicle then you will have to enter the fuel transactions into OLVIMS manually using an "MZ" transaction. Refer to AFCSM 24-1, para 5.3.20.4.

A3.7. Backups. BACKUPS WILL SAVE YOU! DO REGULAR BACKUPS. Can't make it any clearer than that. After every processing day you must backup your transactions from that day's processing. OLVIMS asks for a disk and saves all your daily transactions. Save these transactions until you are sure that they have accepted properly. Recommend at least one month. These files will be small so a few months worth will probably fit on one or two disks.

A3.7.1. OLVIMS will prompt you to do weekly database backups. You can also do your own backups by using the "TF" function and using one of the available backup options. Backup the database at least weekly and keep until the monthly is run and you are positive you will not need to backup and rerun the monthly. Although not required, a good rule of thumb is to keep weekly backups until the quarterly has successfully processed. If you have to restore and rerun something, the most you will have to replay into the system will be one weeks worth of transactions.

A3.7.2. When the quarterly is processed you will need to back up your historical files and the electronic historical record. Do not bypass this step.

A3.7.3. Database backups must also be made before and after any significant change to OLVIMS. For example, process a backup before and after a maintenance release. Another recommended backup is before and after running the monthly/quarterly. If the monthly/quarterly processing errors out, then you can restore the database to pre-processing condition.

A3.7.3.1. Use the "TF" function to restore your database should you need to go back to a certain date. If you have the daily files available from after the database you restored you will need to use the "TB" transaction to apply the daily files.

A3.7.3.1.1. Backup and restore procedures can be found in AFCSM 24-1, para 5.5.

A3.8. Preventive Maintenance and Inspections (PM&I). A good PM&I plan will help to distribute your scheduled workload evenly throughout the year. Develop the plan with the following factors in mind: number of vehicles, vehicle types, using organization, manpower availability and seasonal requirements. A good rule of thumb is to have all your PM&Is come into the shop the first three weeks of the month and none on Fridays or the last day of the week. This gives you week four to catch up if necessary and gives you an opportunity to catch any vehicles that may have come due by miles during the month.

A3.8.1. The key to having a good plan is to ensure the inspections are loaded correctly. TO 36-1-191, Chapter 3 tells you what inspections, including special inspections, and intervals are required by vehicle type. It may be necessary to load inspections that are unique to certain types or makes of vehicles. The T.O. or Commercial Manual for that vehicle will tell you if there are any. For example, there may be a five year inspection on a high reach or crane that may not be identified in TO 36-1-191.

A3.8.2. There are a number of transactions in OLVIMS that pertain to loading PM&Is. See AFCSM 42-1, Para 5.3.12. Also the Help Screen (ALT+H) in OLVIMS provides information on PM&I categories, concurrent inspections, and interval codes.

A3.8.2.1. The first transaction is the "BZ" transaction. This transaction is used to add/update PM&I for an individual vehicle. The first two inspections will always be the PM&I and the Annual Inspection. The next three are for special inspections such as wheel bearing repacks, and the last five inspections are for concurrent inspections.

A3.8.2.2. PM&I categories must be loaded in OLVIMS using the "BS" transaction. The PM&I category is set up to have predetermined intervals preloaded into OLVIMS. When a "BZ" is

loaded for a vehicle or "BM" for a management code, you will need to enter the category and all the interval information will preload. This is a great time saver and ensures that vehicles in the same management code have the same intervals loaded. The Help Screen in OLVIMS lists the PM&I categories. A few of them are preloaded and others can be modified to meet local needs or special vehicle requirements. Recommend making a list of the intervals and which management codes use which category. This will help to ensure new vehicles are loaded with the proper category.

A3.8.2.3. Concurrent inspections are loaded into OLVIMS using the "BC" transaction. Concurrent inspections are inspections which can be accomplished at the same time as another inspection. For example if you have a fork lift tine test that is required annually, instead of loading it as a special inspection, it can be loaded concurrently with the annual inspection. When the annual inspection comes due, the tine test will also. There are seven options for the concurrent inspection. Some include, with each annual inspection, with each PM&I, and every time the vehicle comes into the shop. Remember you cannot use a concurrent inspection if there is not another inspection with the same interval.

A3.8.2.4. The last PM&I transaction is the "BM". This transaction is used to establish defaults for all PM&I, special, and concurrent inspections for a management code. It can also be used to change existing intervals on all vehicles within a specified management **c**ode. This is particularly useful if you receive a TCTO or SB that requires a 6 or 12 month inspection for a safety related item that will need to be done for as long as we have the vehicle. The inspection can be added using the "BC" transaction to come due with the PM&I or annual inspection and then loaded into the "BM'" for that management code. Place a "Y" in the mass update field and all the vehicles in that management code will be updated with the new inspection. HOWEVER…if the inspection is for a particular make or model, you may not be able to use the "BM" to mass update, because some of the vehicles in that management code may not apply. In this case each vehicle that will require the additional inspection will need to be updated individually. Lastly, ensure to check the next due dates and M/H/K because they will not be updated. These must be checked using the "BZ" for each vehicle.

A3.9. Delayed Maintenance. As most of us are aware, delayed maintenance is non-safety related repairs on a vehicle that can be put off without damage to the vehicle or which does not make the vehicle unsafe to operate. If a vehicle does require a safety related part/repair then the vehicle must be placed on NMCS status until the parts are received and the repairs are made. There will be many instances where it may be necessary to delay maintenance and have the vehicle sent back to the user. An example could be parts availability for a cosmetic part or a paint job. These repairs do not affect the safe and serviceable condition of the vehicle. The VFM, VMS and supervisors need to pay close attention to what is being deferred. Training plays a huge factor when a mechanic is determining if a repair can be delayed. Ensure your mechanics understand what can and cannot be delayed for maintenance.

A3.9.1. If it has been determined that a repair will be delayed, then all other work must be accomplished on the work order. For the line item that will be deferred, place the correct delayed maintenance code in the maintenance code block. Delayed maintenance codes can be found in the OLVIMS help screen or in AFCSM 24-1, attachment 4. Then enter the estimated hours for the job. When the jobs are entered into OLVIMS you will need to go back to the delayed code field to enter the delayed code. You will not be allowed to enter any labor hours against that job. If there were labor hours taken

for that job you will have to enter another line item. Once the work order is completely closed out a delayed work order will print.

A3.9.2. If the job requires parts then the mechanic will do a parts request. A copy of the parts request and delayed work order will be forwarded to Materiel Control. A second copy of each will be filed in the delayed maintenance file in VM&A.

A3.9.2.1. When the deferred part for the vehicle is received, Materiel Control will send the completed deferred work order back to VM&A. The completed work order will replace the copy and the vehicle can either be scheduled for repair or can be accomplished the next time it comes into the shop.

A3.9.2.2. When the vehicle comes into the shop for the repair, the job will be added to the work order and the delayed information will be removed from the Delayed Maintenance Report. Remove the parts and the delayed hours when you close the work order. You will be asked if you want to charge the parts to the new work. Select "A" for all parts and "I" for individual parts. If you select "I" you will be prompted for which parts to charge. After the parts have been charged, enter an "X" in the "SZ" block. If there are no parts to charge then you will be prompted to delete the delayed labor hours only. Just place an "X" in the "SZ" block.

A3.9.2.2.1. If you forget to charge the parts when the work order closes out you can use an "SW" transaction to charge the parts and an "SZ" to delete the delayed labor hours. See AFCSM 24-1, para 5.3.28 for guidance on how to use these transactions.

A3.10. NMCS. NMCS work orders work just a little different.

A3.10.1. Enter the "WW" screen. Press F2 and enter the work order number to place on NMCS. Press F5 to put the vehicle on NMCS. Enter the NMCS time. If you need to change the date, use the up arrow key to the date field and change it. Enter the estimated labor hours for the repair, the major item to be replaced, answer the question whether the vehicle is drivable or not and then enter any remarks for the NMCS placard. Press Enter to put the vehicle on NMCS.

A3.10.2. Send the work order and parts requests to Materiel Control. At this point you may need to work with the shop supervisor and Materiel Control to determine a new ETIC for the vehicle based on the estimated delivery date of the part.

A3.10.3. When the vehicle comes off NMCS, go into the "WW" screen and press F2. Enter the work order number and then press F6. This will move the curser to the time off NMCS field. If you need to change the date, use the up arrow to move the cursor and change the date. Enter the time and the vehicle will come off NMCS.

A3.10.4. On and off NMCS can also be accomplished by using the "SZ" transaction without having to go into the "WW" screen.

A3.11. Limited Technical Inspection (LTI). This inspection is used to determine the condition of a vehicle or piece of equipment. It consists of complete functional testing of the item and all components. Inspection will be required to determine if vehicle is acceptable, repairable or should be processed for disposal. Document the inspection on AFTO Form 91*, Limited Technical Inspection.* Information on LTIs is found in T.O. 36-1-191, Chapter 1 and instructions for using the OLVIMS Automated LTI are in AFCSM 24-1, Atch 9.

A3.11.1. The information which you provide on an LTI is used to make repair decisions at local, MAJCOM and AF levels. Ensure that the information provided is as accurate as possible. DO NOT inflate LTIs to "get rid" of a vehicle. Decisions to salvage or repair a vehicle are made based on the information provided in the LTI. Be accurate!!

A3.11.2. Acceptance: When a new vehicle arrives at your location it should be inspected for serviceability and damage. An LTI is not required unless directed by the VFM to note any discrepancies found. If the vehicle is received from another base then use the LTI shipped with the vehicle to accomplish the inspection.

A3.11.3. Shipping: Prepare an LTI for vehicles being shipped to TDY locations or for PCS. Annotate any discrepancies that where not repaired while the vehicle was being prepared for shipment. Send a copy of the LTI with the vehicle. Serviceability standards for shipping vehicles are identified in TO 36-1-191, Chapter 1.

A3.11.4. Disposition: Prepare an LTI for vehicles requiring a repair decision IAW T.O. 36-1-191, chapter 5. Document all discrepancies and forward LTI with the request for disposition instructions to the appropriate level of command. Each MAJCOM may have different requirements for processing vehicles for disposition. Ensure you are familiar with the rules for the command you are assigned to.

A3.11.5. One Time Repair Limit (OTRL): It may be necessary to accomplish an LTI on a vehicle that requires significant repairs. If the vehicle requires repairs that may exceed the OTRL, stop the repairs and accomplish an LTI. Determine if the vehicle is economically repairable. Proceed with the repairs if they do not exceed the OTRL. If they do exceed the OTRL, ask for disposition instructions from the appropriate level of command. **NOTE:** One of a kind mission critical vehicles may require immediate repair without regard to OTRL. Consult VFM/VMS for guidance.

A3.12. TCTOs/SBs/OTIs. The host MAJCOM/NAF will notify you of any required inspections for your vehicles. This is another reason that full accountability is critical. If the location of a vehicle is unknown, a critical, possibly life threatening repair might not get accomplished.

A3.12.1. Create a tracking log to monitor compliance with the required inspections. A separate log should be created for TCTOs, SBs and OTIs. Once you are notified of an inspection or repair, log the information including inspection number, title, nature of inspection, reg # of vehicles needing the repair/inspection, suspense, work order number and completion date. You may include any other pertinent data. The log can be automated or simply a general purpose form, whichever suits your needs at the local level.

A3.12.2. Forward the compliance information to headquarters upon completion of the repair/inspection. Some inspections are time critical and my need to be accomplished as soon as you receive notification or within a specified time period after parts are received. Ensure you read the entire TCTO/SB/OTI before accomplishing the inspection to make sure you understand all the requirements.

A3.13. Deficiency Reports (DR). The guidelines for deficiency reporting are explained in T.O. 36-1-191, Chapter 7. T.O. 00-35D-54 is the overarching guidance for AF deficiency reporting.

A3.13.1. It is critical that you report deficiencies in a timely manner and as detailed as possible. DRs that identify problems can lead to service bulletins, TCTOs or OTIs that may affect vehicles across the Air Force. A typical misconception about DRs is that if a report has already been submitted by another

base then you don't have to do one. WRONG!! The more documentation concerning a vehicle deficiency the better.

A3.13.2. There are four different types of deficiencies. Review the four types to determine if the problem you are having warrants a DR. If you are unsure, submit the DR and let the experts determine if it warrants further investigation.

A3.13.2.1. Design Deficiency. A condition that limits or prevents the use of the vehicle for the intended purpose. These conditions cannot be corrected except through a design change.

A3.13.2.2. Maintenance Deficiency. A condition which results in excessive maintenance man-hour expenditures.

A3.13.2.3. Materiel Deficiency. A failure of a major assembly, subassembly, or omponent, which if uncorrected, may cause death, injury or severe occupational illness; or would cause loss or damage to a vehicle.

A3.13.2.4. Quality Deficiency. Errors in workmanship, nonconformance to specifica-tions or other technical requirements. Failures or malfunctions which cannot be attributed to errors in workmanship will not be reported as quality defects.

A3.13.3. Once you determine that a DR is required, you will need to initiate the correct report. The following are the four report categories:

A3.13.3.1. Materiel Deficiency Report (MDR). This report is required when conditions occur which may cause death, severe injury or occupational illness; would cause loss or damage to a vehicle; or directly restrict the combat readiness capability the using organization.

A3.13.3.2. Vehicle Unsatisfactory Report (VUR). This report is required when a vehicle does not meet the user needs; a vehicle's design, depot repair remanufacture is unsatisfactory; or premature materiel failure or equipment malfunction does not meet MDR criteria.

A3.13.3.3. Action Warranty Report (AWR). This report is required on all vehicles/equipment when the contractor refuses to make corrections under warranty.

A3.13.3.4. Warranty Satisfactory Report (IWR). This report is required for all vehicles/equipment when the manufacturer/contractor satisfactorily corrects the deficiency in a timely manner and value of the repairs exceeds $1000.00 or when three or more vehicles have the same deficiency satisfactorily corrected regardless or cost.

A3.13.4. Process the report using the DREAMS II program. Templates and instructions on how to use DREAMS II should be available on host MAJCOM's website or the DREAMS II website at Wright-Patterson AFB: **https://www.asc.wpafb.af.mil/infocen/tools.htm**.

A3.14. OLVIMS Reports. There is a lot of information within OLVIMS to assist you in managing the vehicle fleet. OLVIMS has many standard pre-formatted reports and it also has the capability to import OLVIMS data into Excel, Access or other programs to manipulate and display data as the user requires.

A3.14.1. When the end-of-day processing is complete, the system will have created a number of reports that will be current at that time. You can review these reports by entering "ZR" at the main menu. Place a "Y" in the column next to the report and you will be able to view it.

A3.14.2. As you make changes to the system, the reports in the print folder will become outdated. If you need a current report you can enter “ZD” at the OLVIMS main menu and place a “Y” next to the report you wish to create. Press F3 to create the report. The report can be viewed when it is produced or at a later time. **NOTE:** If you create a new report, the old report will be overwritten. If you wish to save an old report, you must copy the file to another folder before creating the new report. All reports are kept in the C:\OLVIMS\PRINT\ folder.

A3.14.3. AFSCM 24-1, Chapter 2 explains the available OLVIMS reports. Chapter 5 explains daily reports, Chapter 6 explains monthly reports and chapter 7 explains quarterly reports.

A3.14.4. There are many retrievals available within OLVIMS as well. Enter “R” at the OLVIMS main menu for a list of retrieval options. Some of the “Canned” retrievals require historical data and some are based on current data. If historical data is required, the information will need to be provided. You will need the monthly historical backups to process these retrievals. AFCSM 24-1, Chapter 8 explains retrieval processing.

A3.14.4.1. “Ad Hoc” retrievals can be produced for local reporting requirements. OLVIMS allows you to download files to import onto Excel, Access or another program which allows you to manipulate text data. This is somewhat advanced for the scope of this guide, so if you wish to use this option you will need to get training from an experienced controller or contact the host MAJCOM for assistance.

Attachment 4

CONTINGENCY AFIS GUIDE

A4.1. This guide was developed to assist VM shops that have AFIS responsibility but do not have a trained fleet manager assigned. It can also be used by VM&A sections not equipped with the full spectrum of experience. This guide is not all inclusive. It should be used along with the AFIS user's manual and higher headquarters guidance.

A4.1.1. The majority of this information assumes AFIS is already established or a contingency database has been provided. Contact NAF or host MAJCOM immediately if this is not the case.

A4.1.2. Common AFIS codes are listed at the back of this attachment.

A4.2. Receiving RDO Vehicles (Vehicles from other bases). Before trying to load a vehicle in AFIS, determine where it will be assigned and if it will replace another vehicle or fill an open authorization. Use the Base Master Vehicle Authorized/Assigned Report to decide which vehicle should be replaced. Use the I&S/In-Use Stock Number or the Management Code to locate the vehicle type. Use the Replacement Code (identified by "RC") to determine which vehicles in that management code are replacement eligible. You also may want to run a "Fleet Open Authorization" report. This report is located in the "Report Option" menu which is found in the "Asset Information" Menu. Ref: AFMAN 23-110, Vol II, Part 2, Ch. 22 and AFI 24-302

A4.2.1. Once you have determined the authorization that will be filled, follow the steps below to receipt the vehicle:

A4.2.1.1. AFIS (USE CAPS LOCK). From the Main Menu:

A4.2.1.1.1. Select "Asset Info Menu".

A4.2.1.1.2. Next Select "Due-In Program Menu".

A4.2.1.1.3. Then Select "Vehicles Receipted RDO".

A4.2.1.1.4. Type in the registration number.

A4.2.1.1.5. Next, type in the asset stock number. This can be found on the DD Form 1348-1A (or DD Form 1149, depending on how the vehicle was shipped). If you do not have this form, look for the vehicle data plate.

A4.2.1.1.6. Then type in the shipping document number. This number is also located on the DD Form 1348-1A (or DD Form 1149). It is in position 24 on this form and should start out with an "FE".

A4.2.1.1.7. You will then be asked, "How do you want to assign" and will be given four choices. Since you have researched the authorizations, the best way is to select "VAL serial". This will only bring up the selected authorization. The other three choices will bring up all authorizations listed in that field.

A4.2.1.1.8. Print screen and save for records.

A4.3. Receiving Lease/Rental Vehicles. Before trying to load a vehicle in AFIS, determine where it will be assigned and if it will replace another vehicle or fill an open authorization. Use the Base Master Vehi-

cle Authorized/Assigned Report to decide which vehicle should be replaced. You also may want to run a "Fleet Open Authorization" report. This report is located in the "Report Option" menu which is found in the "Asset Information" Menu. Once you have determined the authorization to fill, follow the steps below to receipt the vehicle: Ref: AFMAN 23-110, Vol II, Part 2, Ch. 22 and AFI 24-302

A4.3.1. AFIS (USE CAPS LOCK). From the Main Menu:

A4.3.1.1. Select "M06 Information Menu".

A4.3.1.2. Next Select "Add/Delete A Leased Vehicle".

A4.3.1.3. Then Select "Add Leased Vehicle".

A4.3.1.4. Type in the vehicle plate number or locally assigned registration number.

A4.3.1.5. Next, type in the locally assigned stock number. This stock number will be an L or P number. Example 2310PGB1021200. This stock number would be assigned to a B102 Sedan Class II with a gasoline engine. For a list of existing locally assigned vehicle stock numbers with vehicle types, see the Equipment Management Section of LRS.

A4.3.1.6. You will then be asked, "How do you want to assign" and will be given four choices. Since you have researched the authorizations, the best way is to select "VAL serial". This will only bring up the selected authorization. The other three choices will bring up all authorizations listed in that field.

A4.3.1.7. Print screen and save for records.

A4.4. Receiving New Vehicles. Before trying to load a vehicle in AFIS, determine where it will be assigned and if it will replace or fill an open authorization. Use the Base Master Vehicle Authorized/ Assigned Report to decide which vehicle should be replaced. Use the I&S/In-Use Stock Number or the Management Code to locate the vehicle type. Use the Replacement Code (identified by "RC") to determine which vehicles in that management code are replacement eligible. You also may want to run a "Fleet Open Authorization" report. This report is located in the "Report Option" menu which is found in the "Asset Information" Menu. Once you have determined the authorization that will be filled, follow the steps below to receipt the vehicle. Ref: AFMAN 23-110, Vol II, Part 2, Ch. 22 and AFI 24-302

A4.4.1. AFIS (USE CAPS LOCK). From the Main Menu:

A4.4.1.1. Select "Asset Info Menu".

A4.4.1.2. Next Select "Due-In Program Menu".

A4.4.1.3. Then Select "Delete, Edit, or Receipt A Due-In".

A4.4.1.4. Select "Receipt a due-in". Enter in the due-in stock number. **NOTE:** This number may not match the asset stock number found on the vehicle.

If more than one of the same stock numbers is loaded, use the current fiscal year.

A4.4.1.5. Hit "R" for receipt and then type the vehicle registration number. Make sure you use all eight characters.

A4.4.1.6. You will then be asked, "How do you want to assign" and will be given four choices. Since you have researched the authorizations, the best way is to select "VAL serial". This will only

bring up the selected authorization. The other three choices will bring up all authorizations listed in that field.

A4.4.1.7. Print screen and save for records.

A4.5. Rotating, Adding and Deleting GSA Vehicles in AFIS. Ref: AFMAN 23-110, Vol II, Part 2, Ch. 22 and AFI 24-302

A4.5.1. From the Main Menu:

A4.5.1.1. Press “F-9” and enter registration number (GSA number without the letter prefix).

A4.5.1.2. Write down the old vehicle’s Prime Stock Number, Asset Stock Number, Document Number, Allowance I.D. and VAL Serial Number.

A4.5.1.3. Return to Main Menu and select “M06 Info File”.

A4.5.1.4. Select “Add/Delete Leased Vehicle”.

A4.5.1.5. Type in registration number and select “D” to delete, select “Y” when asked if you’re sure you want to delete.

A4.5.1.6. Return to Main Menu. Select “Asset Information Menu”, then “Base VAL Program Menu”.

A4.5.1.7. Edit “Resident Base File”.

A4.5.1.8. Select “S” to Edit by Serial Number.

A4.5.1.9. Type the VAL Serial Number you want to edit.

A4.5.1.10. Type “U” for update.

A4.5.1.11. Place a 1 in front of Qty Auth (Quantity Authorized).

A4.5.1.12. Return to Main Menu, then select “M06 Info File”.

A4.5.1.13. Select “Add/Delete Leased Vehicle” and select “Add”.

A4.5.1.14. Type in new vehicles registration number.

A4.5.1.15. Assign a locally generated stock number.

A4.5.1.16. Insert stock number and press “Enter”.

A4.5.1.17. Select how the vehicle will be assigned. Always select by “VAL Serial Number”.

A4.5.1.18. When asked, “Which Val Serial Number?”, Type in “VAL Serial Number” and press “Enter”. Press “Enter” again.

A4.5.1.19. Assign a Fuel Code. Should be the same as the one used when establishing locally generated stock number.

A4.5.1.20. Select Replacement Code. Always use a “U” for GSA.

A4.5.1.21. Return to Main Menu and exit AFIS.

A4.6. Change/Edit Asset Information.

A4.6.1. From the Main Menu:

A4.6.1.1. Select “M06 Information Menu”.

A4.6.1.2. Select “Edit the Asset File”.

A4.6.1.3. Type in vehicle’s registration number (04D00064 for Blue Fleet, 41-54321 for GSA, etc.).

A4.6.1.4. Select “E” for Edit.

A4.6.1.5. Make necessary changes (specific asset changes only).

A4.6.1.6. Use “CTRL W” to save info.

A4.6.1.7. Select “Y” or “N” for more changes.

WARNING: This should be the **last** option used to update vehicle data! Updates should be accomplished via normal changes (e.g. inputting new vehicle data into AFIS). All menu driven options should be used first whenever possible. The reason is updating data by this method updates the individual asset record only in the ESCM06.DBF file. If an error is made, the system will be unable to match the vehicle to the appropriate authorization record and may drop the vehicle from queries and reports.

A4.7. Edit Base VAL

A4.7.1. Go to the Asset Info Menu.

A4.7.2. Base VAL Program Menu.

A4.7.3. Edit Resident Base VAL.

A4.7.4. Type “S” for Serial (Always Edit, Assign or Delete by VAL Serial Number – NEVER BY NSN or Stock Number).

A4.7.5. Type in VAL Serial Number.

A4.7.6. Make necessary changes.

A4.7.7. Use “CTRL W” to save info.

A4.8. How to Look Up a Vehicle in AFIS:

A4.8.1. Select “F9”.

A4.8.2. Type in Registration number (04D00064 for Blue Fleet, 41-54321 for GSA, etc.).

A4.9. How to look up vehicles by Mgt Code

A4.9.1. Go to the Asset Information Menu.

A4.9.2. Select “Report Option Menu”.

A4.9.3. Go to “Master Vehicle Report Menu”.

A4.9.4. Select “Master Organizational Code”.

A4.9.5. Type in the Master Organizational Code.

A4.9.6. Select “P” for print or “S” for screen.

A4.10. Look up Vehicles by Management Code

A4.10.1. Go to the Asset Information Menu.

A4.10.2. Select “Report Option Menu”.

A4.10.3. Go to “Master Vehicle Report Menu”.

A4.10.4. Select “VIMS Management Code”.

A4.10.5. Type in the Management Code.

A4.10.6. Select “P” for print or “S” for screen.

A4.11. How to Back up AFIS

A4.11.1. AFIS must be backed up DAILY!

A4.11.2. Start at Main Menu.

A4.11.3. Go to “Systems Maintenance Menu”.

A4.11.4. Index/Pack files first (Takes about 10 seconds).

A4.11.5. Back-up Restore Files Menu.

NOTE: BACK UP…DO NOT RESTORE UNLESS YOU LOST ALL AFIS INFO (that is why you back up the system daily).

A4.11.6. Select “A” for A drive and press “Enter”.

A4.11.7. Press “Enter” again (takes about 20-25 seconds).

A4.11.8. Process is finished, return to the Main Menu.

A4.12. Placing Blue Fleet Vehicles into Excess Status in AFIS. Ref: AFMAN 23-110, Vol II, Part 2, Ch. 22 and AFI 24-302.

A4.12.1. Look up vehicle by using “F9”. Write down Prime Stock Number, Asset Stock Number, Document Number, AID (allowance identifier) and VAL Serial Number.

A4.12.2. Go to “Asset Information Menu”.

A4.12.3. Select “LTI Program Menu”.

A4.12.4. Add LTI Menu.

A4.12.5. Enter “X” for Excess.

A4.12.6. Type in vehicle registration number.

A4.12.7. Create a Document Number (8000-8999).

A4.12.8. Put 0O for Org Master and Org User.

A4.12.9. Type “Excess” in “User” field.

A4.12.10. Type “EXCESS LTI” in “Memo” field.

A4.12.11. Press “CTRL W” to save.

NOTE: Excess vehicles are to be dispositioned (shipped, salvaged, reassigned) within 60 days of excess status. If instructions have not been received, follow up with the appropriate disposition authority (unit CC or MAJCOM) as determined by AFI 24-302.

A4.13. Placing Blue Fleet Vehicle into Excess Status in SBSS

A4.13.1. Create Excess Authorization using REMS Users Guide.

A4.13.2. Rotate vehicle into excess authorization using REMS users' guide.

A4.14. Shipping Blue Fleet Vehicle in AFIS. Look up vehicle using "F-9". Write down Prime Stock Number, Asset Stock Number and Document Number. It will not have an Asset I.D. Number or VAL Serial Number if already in Excess status. If vehicle is not in excess status write done the Asset I.D. Number and VAL Serial Number.

A4.14.1. Go to "Asset Information Menu"

A4.14.2. Then go to "Ship, Salvage, Rotate Menu".

A4.14.3. Select "Ship a Vehicle".

A4.14.4. Type in the Registration Number.

A4.14.5. Select "S" to ship.

A4.14.6. Type in gaining SRAN.

A4.14.7. Enter gaining Command's code.

A4.14.8. An "AF Form 2005 Menu" prompt will appear.

A4.14.9. Select "N" for no or "Y" for yes when prompted with "Ship Another Vehicle".

A4.14.10. The next box will be "Pack Database". Select 'N'.

A4.14.11. Accomplish the AF Form 2005 for turn in to Document Control.

A4.15. Placing Blue Fleet Vehicle into Salvage Status in AFIS. Once DRMS instructions are received from host MAJCOM, process vehicles to DRMS using the following procedures:

A4.15.1. Log in to AFIS.

A4.15.2. Look up vehicle using "F-9". Write down Prime Stock Number, Asset Stock Number and Document Number.

A4.15.3. From the Main Menu, go to "Asset Information Menu".

A4.15.4. Then select "Ship, Salvage, Rotate Menu".

A4.15.5. Choose "DRMS (Salvage) a Vehicle".

A4.15.6. Type in registration number and select "D" to DRMS.

A4.15.7. Type in "Salvage Authority" from the LTI log book. This will usually be MAJCOM or Local authority.

A4.15.8. The "2005 Menu" will pop-up, Then "Would You Like To Do Another?" will appear. Select "Y" or "N" depending on what you need to do.

A4.15.9. If you select “Y” the “Do You Want To Pack Database?” option will appear, select “N”.

A4.15.10. Return to ‘Main Menu’ and exit from AFIS.

A4.15.11. Create an AF Form 2005 and turn it in to document control with the DD Form 1348-1A created during Supply Automated Tracking System (SATS) transaction.

A4.16. Use Codes and Item Codes. Indicate the intended use of vehicles and equipment.

A4.16.1. **A -** Mobility Equipment

A4.16.2. **B** - Support Equipment

A4.16.3. **C -** Joint-Use Equipment

A4.16.4. **D** - WRM Equipment and Supplies

A4.16.5. **J** - Vehicle Asset (Mobility)

A4.16.6. **K** - Vehicle Asset (Support)

A4.16.7. **L** - Vehicle Asset (Joint-Use)

A4.16.8. **M** - Vehicle Asset (WRM)

A4.17. Item Codes. Indicates relationship of an equipment item to an authorized item.

A4.17.1. **P** - Authorized (preferred item of stock number, prime NSN)

A4.17.2. **S** - Suitable substitute for an authorized item

A4.17.3. **U** - Unsatisfactory (utilization item) substitute for an authorized item

A4.18. Vehicle Status Codes. These codes indicate the current utilization, physical status or loss of a vehicle.

A4.18.1. **A** - Assigned for authorized use (except for use code M assets). ASC cannot be "000" or "987".

A4.18.2. **B** - Vehicle is being shipped to a repair activity. Disposition instructions have been, or will be, provided to the repair facility by the MAJCOM CEMO. The vehicle will not return to the former owning organization and is a loss to the COS.

A4.18.3. **C** - Vehicle is used for maintenance training (ATC only).

A4.18.4. **D** - Disposition instructions have been received, but vehicle accountability is being maintained on authorized and or in-use and REM-vehicles-only detail records pending shipment, maintenance transfer to DRMS, sale, etc.

A4.18.5. **E** - Vehicle is unserviceable. Accountability is being on authorized or in-use and REM-vehicle-only detail records until transfer to DRMS. Cannibalization is authorized before transferring to DRMS.

A4.18.6. **F** - Vehicle assigned to a special project or exercise (not WRM or Mobility). Use code must be "K".

A4.18.7. **G** - Vehicle is being shipped to a facility for repair and subsequent IM directed redistribution. The vehicle is a loss to the base and excess to the MAJCOM.

A4.18.8. **H** - Vehicle is in place for an authorized WRM requirement and is in serviceable condition. ASC must be a BASS composition code, and use code must be "M".

A4.18.9. **I** - Vehicle has been set to the maintenance activity awaiting LTI action.

A4.18.10. **J** - Vehicle is not authorized but is in-use and required. AF Form 601 submitted to MAJCOM for approval (ASC 000A must be assigned).

A4.18.11. **K** - Vehicle is excess to the owning MAJCOM and is being held at the direction of the IM for distribution instructions. ASC 000 must be assigned and use code must be "K".

A4.18.12. **L** - Vehicle is on loan in excess of 30 days to a non-Air Force organization. ASC 051 must be assigned and use code must be "K".

A4.18.13. **M** - Vehicle is being transferred to DRMS. The REMS monitor must ensure that the Vehicle Historical Record cites the specific disposal activity and location.

A4.18.14. **N** - Vehicle is unserviceable and disposition instructions have been requested from the owning MAJCOM.

A4.18.15. **P** - TIN code is used for all other physical losses where the vehicle will not return to Air Force REMS. Examples include losses to DOD or governmental agencies, foreign governments, commercial agencies (excluding Air Force Vehicles on loan to contractors), theft, etc. The REMS manager must submit a delete (loss) record (An off-line shipment must be processed to remove the vehicle from stock control supply records following a status code "P" TIN). Be sure that the Vehicle Historical Record lists applicable recipients or other clarifying specifics.

A4.18.16. **Q** - Used for turn-in inputs to correct erroneously assigned registration numbers stock numbers, etc. For example, the vehicle was gained in error, the registration or stock number was entered incorrectly, or there was a change in status from REMS to non-REMS. This code will not be used for normal file maintenance stock number changes distributed through Stock Number User Directory (SNUD).

A4.18.17. **R** - At the option of the MAJCOM, the status code may be changed to "R" for vehicles in base or depot-level repair for over 60 days-accountability remains on local REMS records.

A4.18.18. **S** - Vehicle transferred to an organization of another MAJCOM. The losing and gaining organizations are both supported by the same COS.

A4.18.19. **T** - Vehicle is in-transit to an Air Force activity of another MAJCOM and is a loss to the COS and MAJCOM. The TIN input reflecting code T will not be processed until immediately before turn over of the vehicle to transportation.

A4.18.20. **U** - Vehicle is in-transit to an Air Force activity of the same MAJCOM. Vehicle is a loss to the COS.

A4.18.21. **V** - Vehicle is on loan within or between commands not to exceed 180 days. ASC must be "987" and use code must be "J" or "K".

A4.18.22. **W** - Vehicle is being held by AFLC for system support requirements. (AFLC use only)

A4.18.23. **X** - Vehicle is excess to base and pending command action (ASC 000). Use code must be "K".

A4.18.24. **Y –** In-place WRM asset is in unserviceable (repairable) condition and expected to be out of commission for 30 days or more. Use code "M" applies and ASC must be a BASS composition code.

A4.18.25. **Z** - Vehicle is in-transit to port of embarkation (POE), either to or from overseas destination. It is anticipated that shipment time will exceed 180 days.

Attachment 5

DEPLOYMENT PARTS SOURCING GUIDE

A5.1. This attachment provides possible sources for vehicle parts. Many other options exist and this guide is not intended to limit procurement avenues. Inclusion of any commercial source herein should not be construed as endorsement of same over other commercial sources.

Disclaimer: The appearance of hyperlinks in this handbook does not constitute endorsement by the United States Air Force of the web site or the information, products, or services contained within.

A5.2. Regional Supply Squadrons. The operational location of the AOR will determine who the responsible RSS is. Use the table below to establish contact.

Table A5.1. MAJCOM RSS Contact Information

Regional Supply Squadrons	**DSN Phone**	**E-mail/Web Site** All Web Sites are accessed via AF Portal!! **https://www.my.af.mil/amcrss/**
ACC - Air Combat Command Langley AFB Virginia	312-575-0431/2/3/4/5/6/7	email: **accrss.bos@langley.af.mil**
AMC – Air Mobility Command Scott AFB Illinois	312-779-8486/8590/7152	email: **supply22@scott.af.mil**
PACAF – Pacific Air Forces Hickam AFB Hawaii	315-449-7827	email: **PACAF.RSS.LGSPP@hickam.af.mil** email: **PACAF.RSS.BOS@hickam.af.mil**
USAFE – United States Air Forces Europe Sembach AB Germany	314-496-7264/5/6/9	email: **usaferss/rssmr@sembach.af.mil**
AFSOC – Air Force Special Operations Command Hurlburt Field Florida	312-579-8925	email: **afsoc.LGZ.web@hurlburt.af.mil**

A5.3. Internet:

A5.3.1. DOD EMall: **http://www.dlis.dla.mil/emall.asp**

A5.3.2. NEI 2010: **http://www.nei2010.com/**

A5.3.3. USN Afloat Shopping Guide: **http://www.dlis.dla.mil/navy/asg_guide.asp**. Guide contains extensive NSN listing of common working stock and shop use items. A hard copy catalog, with CD-ROM, can be requested by contacting: **subscription@dlis.dla.mil**.

A5.3.4. Vehicle Parts Supply Organization (VPSO). Located on Elmendorf AFB, AK. Primarily sources parts for PACAF AOR but will provide assistance to any deployed FOL when requested. (DSN317-552-1897/4135/3415/3233, DSN FAX317-552-5405/4744)

A5.3.5. Shipment status can be checked through the following websites:

A5.3.5.1. DHL: **http://www.DHL.com**

A5.3.5.2. FedEx: **http://fedex.com/us/tracking/**

Attachment 6

VEHICLE MAINTAINER INFORMATION SOURCE GUIDE

A6.1. This attachment contains possible information sources for vehicle maintainers at all locations. Aggressive use of internet search engines will provide nearly unlimited possibilities. Inclusion of any commercial source herein should not be construed as endorsement of same over other commercial sources.

Disclaimer: The appearance of hyperlinks in this handbook does not constitute endorsement by the United States Air Force of the web site or the information, products, or services contained within.

A6.2. Military Sources:

A6.2.1. AF2T3 USAF Vehicle Technician Network: **https://www.afca.scott.af.mil/maillist**

A6.2.2. Tactical Vehicle Technical Manuals: **https://www.logsa.army.mil/etms/index.cfm**

A6.2.3. AF Portal: **https://www.my.af.mil/**

A6.2.4. AF VEMSO: **https://www.vemso.hq.af.mil**

A6.2.5. ACC: **https://lg.acc.af.mil/lgt/lgtvm.htm**.

A6.2.6. AMC: **https://amclg.scott.af.mil/cgi-bin/index.pl?dd=/lgt/vmaint&ti=HQ%2BAMC/LGTV%2BVehicle%2BMaintenance**

A6.2.7. PACAF: **https://www.hqpacaf.af.mil/lg/lgt/lgtv/lgtv.htm**

A6.2.8. USAFE: **https://wwwmil.usafe.af.mil/direct/lg/lgt/lgtvbranch.htm**

A6.2.9. AFMC: **https://www.afmc-mil.wpafb.af.mil/HQ-AFMC/LG/LGR/LGRV/**

A6.2.10. WR-ALC: **https://sevpgm.robins.af.mil/sb/**

A6.2.11. AF Technical Orders and Forms: **http://www.e-publishing.af.mil/forms/spe-clist.asp?type=AFTO**

A6.2.12. WR-ALC Central Technical Data Repository: **https://wwwmil.robins.af.mil/logistics/LGE/LGE1/main_page.htm**

A6.2.13. WR-ALC Technical Manual Support Section: **https://wwwmil.robins.af.mil/logistics/LGE/LGED/LGEDA/default.htm**

A6.2.14. OC-ALC Technical Order Management Section: **http://www.tinker.af.mil/tild/**

A6.2.15. AF, Army and Navy Technical Orders: **http://www.ide.wpafb.af.mil/toprac/techord.htm**

A6.3. MSDS Sources: http://hazard.com/msds/

A6.4. Commercial Sources:

A6.4.1. Arvin Meritor: **www.arvin-meritor.com/tech_library**

Free downloadable maintenance manuals, warranty information, technical bulletins, parts catalogs, etc.

A6.4.2. Roadranger: **www.roadranger.com** Service updates, manuals, troubleshooting guides, training materials, etc.

A6.4.3. Detroit Diesel: **www.detroitdiesel.com** Access to information bulletins, technician guides and special publications. Questions can also be submitted to factory personnel.

A6.4.4. Cummins: **http://quickserve.cummins.com** Parts catalogs, operation and maintenance manuals, troubleshooting guided, service bulletins, warranty alerts, etc.

A6.4.5. International Automotive Technician's Network: **www.iatn.net**. Internet forum for light and heavy vehicle fleet repairs.

A6.4.6. Tunner: **http://www.seitunner.com**

A6.4.7. NGSL: **http://www.myfmcairportsystems.com/**

A6.4.8. Tymco Runway Sweepers: **www.tymco.com**

A6.4.9. John Deere: **www.deere.com/** Includes information on all types of JD equipment including Gators.

A6.4.10. GM: **www.gmgoodwrench.com/**

A6.4.11. Dodge: **www.dodge.com/**

A6.4.12. Ford: **www.fordvehicles.com/**

A6.4.13. Grove Cranes: **http://www.groveworldwide.com/**

A6.4.14. Case Equipment: **www.casece.com/**

A6.4.15. Caterpillar: **www.caterpillar.com/**

A6.4.16. Fluid Dynamics: **http://www.fluiddynamics.net/** Petroleum handling products

A6.4.17. Load-N-Go: **www.loadngo.com** Converts standard truck bed to telephone maintenance style

Attachment 7

RECOMMENDED CONTINGENCY EQUIPMENT GUIDE

A7.1. This list is provided to assist Vehicle Management flights in replacing broken, worn or missing equipment items. It can also be used to expand present repair capability.

Table A7.1. Recommended Contingency Equipment.

NOUN	NSN	QTY
Cart, fueling and defueling	4930-00-104-2942	1 ea
Kit, hydraulic hose repair	4940-00-015-2970	1 ea
Battery charger	6130-00-669-6659	1 ea
Sling, lifting	4910-00-896-1961	1 ea
Grinding machine 1/3 HP	3415-00-541-7241	1 ea
Timing light	4910-01-281-9340	1 ea
Welder	3431-00-846-9636	1 ea
Welding and cutting set	3433-00-935-7964	1 ea
Floor crane	3950-00-888-2446	1 ea
Air compressor*	4310-01-059-4789	1 ea
AGE MC2A low pressure unit	4310-00-547-3741	1 ea
Jack, transmission	4910-00-585-3622	1 ea
Jack stands, 5 ton	4910-00-287-8313	12 ea
Jack stands, 10 ton	4910-00-724-2172	10 ea
Jack, floor, hydraulic, 10 ton	4910-00-289-7233	2 ea
Porto power, 4 ton	4910-00-455-3112	1 ea
Jack, floor, hydraulic, 20 ton	4910-00-860-6587	1 ea
Dolly, tire and wheel	4910-01-009-2449	1 ea
Tester, starting and charging	4910-01-012-2876	1 ea
Plug set, radiator repair	4910-00-273-3660	1 ea
Hoist, A-frame, 2 ton	3900-00-449-7004	1 ea
75 ton hydraulic press	3444-00-254-2125	1 ea
Pressure washer	4940-00-842-2308	2 ea
Key duplicating machine	3419-00-808-0480	1 ea
4 ton dolly jack	4910-00-516-5806	1 ea
Work bench with storage	7125-00-330-0130	2 ea
Storage cabinet	7125-00-357-5517	3 ea

NOUN	NSN	QTY
Tool Cabinet, bottom	5140-00-030-6617	2 ea
Heavy Duty Tire Machine	4910-01-308-7609	1 ea
Center Post Tire Changer	4910-01-237-0292	1 ea
Tire Cage	4910-00-025-0623	1 ea

*Equipment will require Civil Engineering services (plumbing, electrical, floor mounting, etc.)

Attachment 8

RECOMMENDED CONTINGENCY SHOP TOOLS GUIDE

A8.1. This list is provided to assist Vehicle Management flights in replacing broken, worn or missing tools. It can also be used to expand present repair capability.

Table A8.1. Recommended Contingency Shops Tools.

NOUN	NSN	QTY
Battery tester	6625-01-032-4344	2 ea
Drill, electric, 3/8 inch	5130-00-935-7354	2 ea
Drill, electric, 1/2 inch	5130-00-901-7585	1 ea
Drill set, twist	5133-00-293-0983	2 ea
Dresser, wheel, abrasive	5120-00-223-9952	1 ea
Gun, soldering	3439-00-618-6623	2 ea
Hammer, sledge, 6 lbs	5120-00-265-7462	1 ea
Hammer, sledge, 12 lbs	5120-00-224-4130	1 ea
Impact tool, sliding handle	4910-00-788-0591	1 ea
Kit, battery service	6140-00-752-2184	2 ea
Kit, cut and flare, HD	5180-00-596-1038	2 ea
Measure, liquid, 2 qt	7420-00-255-8113	2 ea
Mirror, inspection	5120-01-313-4097	1 ea
Multi-meter, PSN 6 or equivalent	6625-01-079-1762	2 ea
Puller, axle	5120-00-567-8079	1 ea
Puller, kit, bearing	5120-00-423-1596	1 ea
Puller kit, wheel hub	5120-00-926-3605	1 ea
Puller, steering wheel	5180-00-620-0020	1 ea
Set, tap and die	5236-00-357-7504	1 ea
Tester, battery, solution	6630-00-171-5157	1 ea
Tester, cylinder, compression	4920-00-071-8837	1 ea
Tool, clutch aligning	5180-00-449-3785	1 ea
Tool, tire valve	5120-00-516-4220	2 ea
Wheel bearing wrench set	5120-00-169-4586	1 ea
Wrench set, ¾, 14 sockets, 3 handles	5120-00-204-1999	1 ea
Impact wrench, 3/8 inch	5130-00-221-0607	2 ea
Impact wrench, ¾ inch	5130-00-184-1427	2 ea

NOUN	NSN	QTY
Impact wrench, ½ inch	5130-00-889-2134	2 ea
Wrench, torque, ½ inch, 0-250 ft lbs	5120-00-640-6365	2 ea
Wrench, spanner	5120-00-277-9076	1 ea
Wrench, pipe, 36 inch	5120-00-270-4309	2 ea
Wrench, C/B-O, 1&1/16 inch	5120-00-228-9515	1 ea
Wrench, O/E 1&1/16 by 1&1/4 inch	5120-00-187-7134	1 ea
Wrench, box, 1&1/16 by 1&1/8 inch	5120-00-228-9521	1 ea
Wrench, C/B-O 1&1/4 by 1&1/4 inch	5120-00-228-9517	1 ea
Wrench, box, 1&5/16 by 1&1/4 inch	5120-00-184-8676	1 ea
Wrench, OE/Box, 1&5/16 inch	5120-00-228-9518	1 ea
Wrench, 1&5/16 by 1&3/8 inch	5120-00-184-8563	1 ea
Wrench, open, 1&7/16 by 1&1/2 inch	5120-00-184-8564	1 ea
Wrench, box/OE, 1&1/2 inch	5120-00-277-8834	1 ea
Wrench, box/OE, 1&3/4 inch	5120-00-203-4801	1 ea
Apron	8415-00-634-5023	4 ea
Wheel bearing wrenches	5120-00-335-5390	1 ea
Cord, extension, light w/protector	6230-00-146-8898	4 ea
Cutter, pneumatic, hammer	5130-00-901-8245	1 ea
Bolt cutter	5110-00-188-2524	1 ea
Tester, antifreeze	6630-00-247-2968	2 ea
Face goggles	4240-00-269-7912	2 ea
Gauge, vacuum and pressure	4910-00-056-1005	1 ea
Torque wrench, ¾ drive, 0-500 lbs	5120-01-118-3679	1 ea
Torque wrench, 30-150 ft lbs	5120-01-374-1936	1 ea
Tap and die set, metric	5136-01-429-7466	1 ea
Drill set, metric	5133-01-047-0258	2 ea
Blade, hacksaw 12”	5110-01-304-9706	10 ea
Gun, plug	4910-01-286-9414	2 ea
Strap, cargo	5340-00-980-9277	2 ea
Chuck, air lock	4730-00-729-7076	2 ea
Thread File	5110-00-373-1691	2 ea
Extractor Set	5120-00-305-2275	1 ea
Pliers, brake spring	5120-00-690-8044	1 ea

NOUN	NSN	QTY
Pliers, snap ring	5120-01-428-8499	1 ea
Ratchet, torque multiplier, 1” drive	5120-00-574-9318	1 ea
Funnel, plastic	7240-00-404-9795	2 ea
Funnel, flexible, steel	7240-00-559-7364	2 ea
Crowbar, 59”	5120-00-224-1390	1 ea
Wrench, Barrel/Bung	5120-00-244-4389	1 ea
Cable, jumper	6150-01-027-0125	1 ea
Cable, jumper NATO	2590-00-148-7961	1 ea
Adapter, slave cable	5935-00-322-8959	1 ea
Kit, first aid	6540-00-656-1094	3 ea
Padlock	5340-01-346-7462	3 ea

Attachment 9

ARMY - AIR FORCE STRUCTURE COMPARISON

A9.1. Squad (AF ELEMENT) – Nine to 10 soldiers. Typically commanded by a sergeant or staff sergeant, a squad is the smallest element in Army structure. It's size is dependent on its function.

A9.2. Platoon (AF FLIGHT) – 16 to 44 soldiers. A platoon is led by a lieutenant with an NCO as second in command, and consists of two to four squads or sections.

A9.3. Company (AF SQUADRON) – 62 to 190 soldiers. Three to five platoons form a company, which is commanded by a captain with a first sergeant as the commander's principal NCO assistant. An artillery unit of equivalent size is called a battery, and a comparable armored or air cavalry unit is called a troop.

A9.4. Battalion (AF GROUP) – 300 to 1,000 soldiers. Four to six companies make up a battalion, which is normally commanded by a lieutenant colonel with a command sergeant major as principal NCO assistant. A battalion is capable of independent operations of limited duration and scope. An armored or air cavalry unit of equivalent size is called a squadron.

A9.5. Brigade (AF WING expeditionary in nature) – 3,000 to 5,000 soldiers. A brigade headquarters commands the tactical operations of two to five organic or attached combat battalions. Normally commanded by a colonel with a command sergeant major as senior NCO, brigades are employed on independent or semi-independent operations. Armored, cavalry, ranger and Special Forces units this size are categorized as regiments or groups.

A9.6. Division (AF NAF) – 10,000 to 15,000 soldiers. Usually consisting of three brigade-sized elements and commanded by a major general, divisions are numbered and assigned missions based on their structures. The division performs major tactical operations for the corps and can conduct sustained battles and engagements.

A9.7. Corps (AF MAJCOM) – 20,000 to 45,000 soldiers. Two to five divisions constitute a corps, which is typically commanded by a lieutenant general. As the deployable level of command required to synchronize and sustain combat operations, the corps provides the framework for multi-national operations.

Figure A9.1. Enlisted Insignia of the United States Armed Forces.

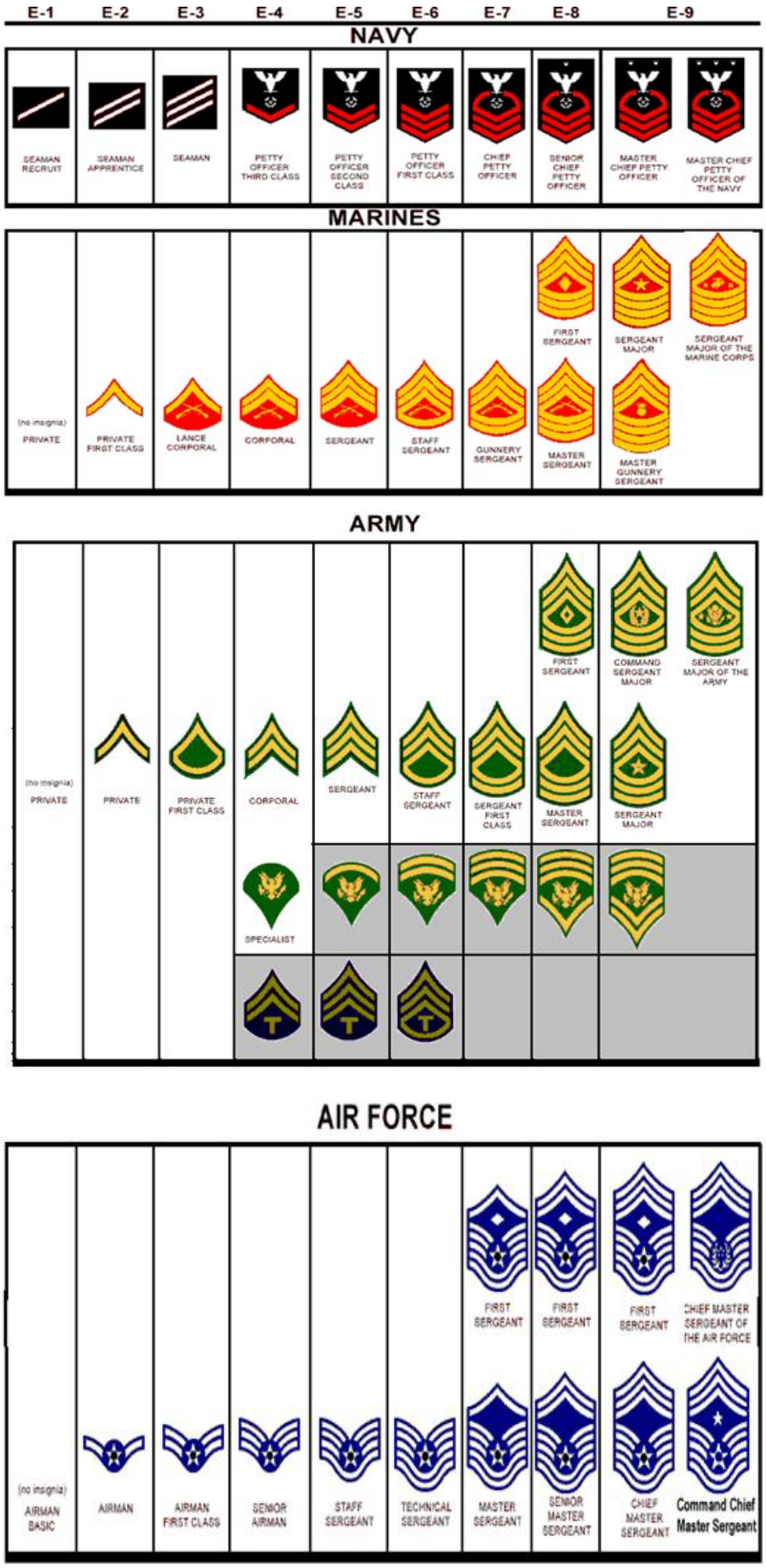

Figure A9.2. Officer Insignia of the United States Armed Forces.